



Open Source Used In APIC 3.2.6

Cisco Systems, Inc.

www.cisco.com

Cisco has more than 200 offices worldwide. Addresses, phone numbers, and fax numbers are listed on the Cisco website at www.cisco.com/go/offices.

Text Part Number: 78EE117C99-2005448972

This document contains licenses and notices for open source software used in this product. With respect to the free/open source software listed in this document, if you have any questions or wish to receive a copy of any source code to which you may be entitled under the applicable free/open source license(s) (such as the GNU Lesser/General Public License), please submit this [form](#).

In your requests please include the following reference number 78EE117C99-2005448972

Contents

1.1 grub 0.97

1.1.1 Available under license

1.2 curl 7.19.7

1.2.1 Available under license

1.3 dbus-python 0.83.0

1.3.1 Available under license

1.4 lua 5.1.3

1.4.1 Available under license

1.5 libjpeg 6b

1.5.1 Notifications

1.5.2 Available under license

1.6 dhcp 4.1.1

1.6.1 Available under license

1.7 openssl 1.0.0

1.7.1 Notifications

1.7.2 Available under license

1.8 tar 1.26

1.8.1 Available under license

1.9 gdb 7.6.1

1.9.1 Available under license

1.10 libxtst 1.2.2

1.10.1 Available under license

1.11 cpio 2.11

1.11.1 Available under license

1.12 dmidecode 3.5

1.12.1 Available under license

1.13 coreutils 8.22

1.13.1 Available under license

1.14 bash 4.1.2

1.14.1 Available under license

1.15 atk 1.28.0

1.15.1 Available under license

1.16 xfsprogs 3.1.1

1.16.1 Available under license

1.17 parted 3.1

1.17.1 Available under license

1.18 sshpass 1.05

1.18.1 Available under license

1.19 ethtool 2.6

1.19.1 Available under license

1.20 rsyslog 7.4.7

1.20.1 Available under license

1.21 d-bus 1.2.24

1.21.1 Available under license

1.22 gir1.2-gdkpixbuf-2.0 2.16.0

1.23 libxcb 1.11

1.23.1 Available under license

1.24 glibc 2.12

1.24.1 Available under license

1.25 pixman 0.32.6

1.25.1 Available under license

1.26 audit 2.2-2.el6

1.26.1 Available under license

1.27 dbus-glib 0.86-6.el6

1.27.1 Available under license

1.28 cyrus-sasl 2.1.23

1.28.1 Available under license

1.29 open-ldap 2.4.40-8.el7

1.29.1 Available under license

1.30 bind 9.8.2

1.30.1 Available under license

1.31 rsync 3.0.6

1.31.1 Available under license

1.32 xmlrpc-c 1.16.24

1.32.1 Available under license

1.33 free-type 2.4.11

1.33.1 Available under license

1.34 libx11 1.6.3

1.34.1 Available under license

1.35 libxml2 2.7.6

1.35.1 Available under license

1.36 rpm 4.8.0

1.36.1 Available under license

1.37 gdkpixbuf 2.18.9

1.37.1 Available under license

1.38 tar 1.2.11

1.38.1 Available under license

1.39 libxcursor 1.1.14

1.39.1 Available under license

1.40 libxdmcp 1.1.1-6.1.el7

1.40.1 Available under license

1.41 libssh2 1.2.2

1.41.1 Available under license

1.42 libsm 1.2.2

1.42.1 Available under license

1.43 sg3-utils 2.0

1.43.1 Available under license

1.44 linux-kernel 3.4.49.0.1

1.44.1 Available under license

1.45 pycurl 7.19.0

1.45.1 Available under license

1.46 libnl3 3.2.21

1.46.1 Available under license

1.47 tcp-wrappers 7.6-57.el6

1.47.1 Available under license

1.48 libart 2.3.20-5.1.el6

1.48.1 Available under license

1.49 openssh 5.3p1

1.49.1 Notifications

1.49.2 Available under license

1.50 ldb 1.3.6

1.50.1 Available under license

1.51 libpciaccess 0.13.4

1.51.1 Available under license

1.52 libgcrypt 1.5.3

1.52.1 Available under license

1.53 firstaidkit 0.3.2

1.53.1 Available under license

1.54 distribute 0.6.10

1.54.1 Available under license

1.55 dosfs-tools 3.0.9-4.el6

1.55.1 Available under license

1.56 libtirpc 0.2.4

1.56.1 Available under license

1.57 iniparse 0.3.1

1.57.1 Available under license

1.58 pygpgme 0.1

1.58.1 Available under license

1.59 python-urlgrabber 3.9.1

1.59.1 Available under license

1.60 yum-metadata-parser 1.1.2

1.60.1 Available under license

1.61 pycairo 1.20.0

1.61.1 Available under license

1.62 procps 3.3.10

1.62.1 Available under license

1.63 tdb 1.41.12

1.63.1 Available under license

1.64 multipath-tools 0.8.3-1

1.64.1 Available under license

1.65 open-iscsi 2.1.6

1.65.1 Available under license

1.66 libxext 1.3.3

1.66.1 Available under license

1.67 pycryptsetup 0.0.11

1.67.1 Available under license

1.68 scddate 1.9.60

1.68.1 Available under license

1.69 python-meh 0.11

1.69.1 Available under license

1.70 firstboot 1.110

1.70.1 Available under license

1.71 libogg 1.1.4-2.1.el6

- 1.71.1 Available under license
- 1.72 slip 0.2.20**
- 1.72.1 Available under license
- 1.73 smartmontools 5.42**
- 1.73.1 Available under license
- 1.74 pango 1.28.1**
- 1.74.1 Available under license
- 1.75 mdadm 3.2.3**
- 1.75.1 Available under license
- 1.76 talloc 2.0.1**
- 1.76.1 Available under license
- 1.77 biosdevname 0.6.2-1.el7**
- 1.77.1 Available under license
- 1.78 gtk 2.18.9**
- 1.78.1 Available under license
- 1.79 cryptsetup 1.4.5**
- 1.79.1 Available under license
- 1.80 zenity 2.28.0-1.el6**
- 1.80.1 Available under license
- 1.81 libuser 0.56.13-5.el6**
- 1.81.1 Available under license
- 1.82 vim 7.2.411-1.8.el6**
- 1.82.1 Available under license
- 1.83 libice 1.0.6-1.el6**
- 1.83.1 Available under license
- 1.84 cairo 1.8.8-3.1.el6**
- 1.84.1 Available under license
- 1.85 consolekit 0.4.1-3.el6**
- 1.85.1 Available under license
- 1.86 lsscsi 0.23-2.el6**
- 1.86.1 Available under license
- 1.87 libpng 1.2.49-1.el6_2**
- 1.87.1 Available under license
- 1.88 libcanberra 0.22-1.el6.centos**
- 1.88.1 Available under license
- 1.89 expat 2.0.1-11.el6_2**
- 1.89.1 Available under license
- 1.90 libnotify 0.5.0-1.el6**
- 1.90.1 Available under license

- 1.91 ncurses 5.7-3.20090208.el6**
 - 1.91.1 Available under license
- 1.92 libglade 2.6.4-3.1.el6**
 - 1.92.1 Available under license
- 1.93 libconfig 1.3.2-1.1.el6**
 - 1.93.1 Available under license
- 1.94 libarchive 2.8.3-4.el6_2**
 - 1.94.1 Available under license
- 1.95 libogg 1.1.4-2.1.el6**
 - 1.95.1 Available under license
- 1.96 libsepol 2.0.41-4.el6**
 - 1.96.1 Available under license
- 1.97 libcap-ng 0.6.4-3.el6_0.1**
 - 1.97.1 Available under license
- 1.98 popt 1.13-7.el6**
 - 1.98.1 Available under license
- 1.99 libcap 2.16-5.5.el6**
 - 1.99.1 Available under license
- 1.100 dmraid 1.0.0.rc16-11.el6**
 - 1.100.1 Available under license
- 1.101 attr 2.4.44-7.el6**
 - 1.101.1 Available under license
- 1.102 libthai 0.1.12-3.el6**
 - 1.102.1 Available under license
- 1.103 gpgme 1.1.8-3.el6**
 - 1.103.1 Available under license
- 1.104 slang 2.2.1-1.el6**
 - 1.104.1 Available under license
- 1.105 cracklib 2.8.16-4.el6**
 - 1.105.1 Available under license
- 1.106 sed 4.2.1-10.el6**
 - 1.106.1 Available under license
- 1.107 gconf 2.28.0-6.el6**
 - 1.107.1 Available under license
- 1.108 acl 2.2.49-6.el6**
 - 1.108.1 Available under license
- 1.109 bzip2 1.0.5-7.el6_0**
 - 1.109.1 Available under license
- 1.110 libaio 0.3.107-10.el6**

- 1.110.1 Available under license
- 1.111 net-tools 1.60-110.el6_2**
 - 1.111.1 Available under license
- 1.112 libtool 2.2.6-15.5.el6**
 - 1.112.1 Available under license
- 1.113 lua 5.1.4-4.1.el6**
 - 1.113.1 Available under license
- 1.114 libvorbis 1.2.3-4.el6_2.1**
 - 1.114.1 Available under license
- 1.115 mtr 0.75-5.el6**
 - 1.115.1 Available under license
- 1.116 libedit 2.11-4.20080712cvs.1.el6**
 - 1.116.1 Available under license
- 1.117 libidn 1.18-2.el6**
 - 1.117.1 Available under license
- 1.118 libgssglue 0.1-11.el6**
 - 1.118.1 Available under license
- 1.119 libgpg-error 1.7-4.el6**
 - 1.119.1 Available under license
- 1.120 netkit-ftp 0.17**
 - 1.120.1 Available under license
- 1.121 sqlite 3.6.20-1.el6**
 - 1.121.1 Available under license
- 1.122 inetutils 1.5**
 - 1.122.1 Available under license
- 1.123 lvm2 1.02.74**
 - 1.123.1 Available under license
- 1.124 libnsl 2.12**
 - 1.124.1 Available under license
- 1.125 nfs-utils 1.2.3**
 - 1.125.1 Available under license
- 1.126 libpng 1.2.44**
 - 1.126.1 Available under license
- 1.127 hostapd 2.10**
 - 1.127.1 Available under license
- 1.128 iputils 20071127**
 - 1.128.1 Available under license
- 1.129 decorator 3.0.1**
 - 1.129.1 Available under license

- 1.130 e2fsprogs 1.41.12**
 - 1.130.1 Available under license
- 1.131 gawk 4.0.2**
 - 1.131.1 Available under license
- 1.132 zlib 1.2.5**
 - 1.132.1 Available under license
- 1.133 libjitterentropy v3.4.1**
 - 1.133.1 Available under license
- 1.134 linux-kernel 4.14.104**
 - 1.134.1 Available under license
- 1.135 dash 0.5.5.1-4.el6**
 - 1.135.1 Available under license
- 1.136 gamin 0.1.10-9.el6**
 - 1.136.1 Available under license
- 1.137 libusb-compat 0.1.12-23.el6**
 - 1.137.1 Available under license
- 1.138 readline 6.0-4.el6**
 - 1.138.1 Available under license
- 1.139 checkpolicy 2.0.22-1.el6**
 - 1.139.1 Available under license
- 1.140 groff 1.18.1.4-21.el6**
 - 1.140.1 Available under license
- 1.141 libnih 1.0.1-7.el6**
 - 1.141.1 Available under license
- 1.142 diffutils 2.8.1-28.el6**
 - 1.142.1 Available under license
- 1.143 mingetty 1.08-5.el6**
 - 1.143.1 Available under license
- 1.144 ustr 1.0.4-9.1.el6**
 - 1.144.1 Available under license
- 1.145 which 2.19-6.el6**
 - 1.145.1 Available under license
- 1.146 epel-release 6-8**
 - 1.146.1 Available under license
- 1.147 libutempter 1.1.5-4.1.el6**
 - 1.147.1 Available under license
- 1.148 selinux 2.0.22-1.el6**
 - 1.148.1 Available under license
- 1.149 libusb 0.1.12-23.el6**

- 1.149.1 Available under license
- 1.150 readline 6.0**
 - 1.150.1 Available under license
- 1.151 makedev 3.24-6.el6**
 - 1.151.1 Available under license
- 1.152 libffi 3.0.5-3.2.el6**
 - 1.152.1 Available under license
- 1.153 kerberos 1.10.3-10.el6_4.4**
 - 1.153.1 Available under license
- 1.154 rpm 4.8.0-32.el6**
 - 1.154.1 Available under license
- 1.155 xz 4.999.9-0.3.beta.20091007git.el6**
 - 1.155.1 Available under license
- 1.156 sysv-init 2.87-4.dsfc.el6**
 - 1.156.1 Available under license
- 1.157 zlib 1.2.3**
 - 1.157.1 Available under license
- 1.158 findutils 4.4.2-6.el6**
 - 1.158.1 Available under license
- 1.159 d-bus 1.2.24-7.el6_3**
 - 1.159.1 Available under license
- 1.160 module-init-tools 3.9-21.el6_4**
 - 1.160.1 Available under license
- 1.161 selinux 2.0.94-5.3.el6_4.1**
 - 1.161.1 Available under license
- 1.162 pciutils 3.1.4**
 - 1.162.1 Available under license
- 1.163 nss 3.14.3-4.el6_4**
 - 1.163.1 Available under license
- 1.164 grep 2.6.3-3.el6**
 - 1.164.1 Available under license
- 1.165 elfutils 0.152-1.el6**
 - 1.165.1 Available under license
- 1.166 glibc 2.12-1.107.el6_4.2**
 - 1.166.1 Available under license
- 1.167 berkeley-db 4.7.25-17.el6**
 - 1.167.1 Available under license
- 1.168 gawk 3.1.7-10.el6**
 - 1.168.1 Available under license

- 1.169 tzdata 2013c-2.el6**
 - 1.169.1 Available under license
- 1.170 python 2.6.6-37.el6_4**
 - 1.170.1 Available under license
- 1.171 polycoreutils 2.0.83-19.30.el6**
 - 1.171.1 Available under license
- 1.172 util-linux 2.17.2-12.9.el6_4.3**
 - 1.172.1 Available under license
- 1.173 gmp 4.3.1-7.el6_2.2**
 - 1.173.1 Available under license
- 1.174 tpm-tools 1.3.4-2.el6**
 - 1.174.1 Available under license
- 1.175 pykickstart 1.74.10**
 - 1.175.1 Available under license
- 1.176 chkconfig 1.3.49.3-2.el6**
 - 1.176.1 Available under license
- 1.177 pam 1.1.1-13.el6**
 - 1.177.1 Available under license
- 1.178 python-setuptools 0.6.10-3.el6**
 - 1.178.1 Available under license
- 1.179 e2fsprogs 1.41.12-14.el6_4.2**
 - 1.179.1 Available under license
- 1.180 iconv 2.12**
 - 1.180.1 Available under license
- 1.181 pcre 7.8**
 - 1.181.1 Available under license
- 1.182 libpciaccess 0.13.1-2.el6**
 - 1.182.1 Available under license
- 1.183 ethtool 3.5-1.el6**
 - 1.183.1 Available under license
- 1.184 bash 4.1.2-15.el6_4**
 - 1.184.1 Available under license
- 1.185 nss-softokn 3.14.3-3.el6_4**
 - 1.185.1 Available under license
- 1.186 libdrm 2.4.39-1.el6**
 - 1.186.1 Available under license
- 1.187 initscripts 9.03.38-1.el6.centos.2**
 - 1.187.1 Available under license
- 1.188 berkeley-db 4.7.25**

1.188.1 Available under license
1.189 pyyaml 3.10-3.el6
1.189.1 Available under license
1.190 cpio 2.10-11.el6_3
1.190.1 Available under license
1.191 binutils 2.20.51.0.2-5.36.el6
1.191.1 Available under license
1.192 libnsl 2.12
1.192.1 Available under license
1.193 iputils 20071127-17.el6_4
1.193.1 Available under license
1.194 upstart 0.6.5-12.el6_4.1
1.194.1 Available under license
1.195 wget 1.12
1.195.1 Available under license
1.196 zlib 1.2.3-29.el6
1.196.1 Available under license
1.197 pcre 7.8-6.el6
1.197.1 Available under license
1.198 setup 2.8.14-20.el6
1.198.1 Available under license
1.199 less 436-10.el6
1.199.1 Available under license
1.200 libssh2 1.4.2-1.el6
1.200.1 Available under license
1.201 python-nss 0.11
1.201.1 Available under license
1.202 nss-util 3.14.3-3.el6_4
1.202.1 Available under license
1.203 hwdata 0.233-7.9.el6
1.203.1 Available under license
1.204 tar 1.23-11.el6
1.204.1 Available under license
1.205 curl 7.19.7-37.el6_4
1.205.1 Available under license
1.206 plymouth 0.8.3-27.el6.centos
1.206.1 Available under license
1.207 iptables 1.4.7-9.el6
1.207.1 Available under license

- 1.208 efibootmgr 0.5.4-10.el6**
 - 1.208.1 Available under license
- 1.209 dracut 004-303.el6**
 - 1.209.1 Available under license
- 1.210 libyaml 0.1.3-1.el6**
 - 1.210.1 Available under license
- 1.211 centos-release 6-3.el6.centos.9**
 - 1.211.1 Available under license
- 1.212 gdbm 1.8.0-36.el6**
 - 1.212.1 Available under license
- 1.213 kbd 1.15-11.el6**
 - 1.213.1 Available under license
- 1.214 trousers 0.3.4-4.el6**
 - 1.214.1 Available under license
- 1.215 shadow-utils 4.1.4.2-13.el6**
 - 1.215.1 Available under license
- 1.216 psmisc 22.6-15.el6_0.1**
 - 1.216.1 Available under license
- 1.217 coreutils 8.4-19.el6_4.2**
 - 1.217.1 Available under license
- 1.218 nspr 4.9.5-2.el6_4**
 - 1.218.1 Available under license
- 1.219 pciutils 3.1.10-2.el6**
 - 1.219.1 Available under license
- 1.220 libsemanage-common 2.0.43-4.2.el6**
 - 1.220.1 Available under license
- 1.221 dbus-glib 0.86-6.el6**
 - 1.221.1 Available under license
- 1.222 cyrus-sasl 2.1.23-13.el6_3.1**
 - 1.222.1 Available under license
- 1.223 iproute 2.6.32-23.el6**
 - 1.223.1 Available under license
- 1.224 texinfo 4.13a-8.el6**
 - 1.224.1 Available under license
- 1.225 kerberos 1.10**
 - 1.225.1 Available under license
- 1.226 file 5.04-15.el6**
 - 1.226.1 Available under license
- 1.227 glib 2.22.5-7.el6**

- 1.227.1 Available under license
- 1.228 patch 2.6-6.el6**
 - 1.228.1 Available under license
- 1.229 open-ldap 2.4.23-32.el6_4.1**
 - 1.229.1 Available under license
- 1.230 ca-certificates 2010.63-3.el6_1.5**
 - 1.230.1 Available under license
- 1.231 keyutils 1.4-4.el6**
 - 1.231.1 Available under license
- 1.232 gzip 1.3.12-19.el6_4**
 - 1.232.1 Available under license
- 1.233 openssl 1.0.0-27.el6_4.2**
 - 1.233.1 Available under license
- 1.234 cpp 4.4.7-3.el6**
 - 1.234.1 Available under license
- 1.235 pexpect 2.3-6.el6**
 - 1.235.1 Available under license
- 1.236 procps 3.2.8-25.el6**
 - 1.236.1 Available under license
- 1.237 redhat-logos 60.0.14-12.el6.centos**
 - 1.237.1 Available under license
- 1.238 python-argparse 1.2.1-2.el6**
 - 1.238.1 Available under license
- 1.239 fontconfig 2.10.95**
 - 1.239.1 Available under license
- 1.240 gnutls 3.3.8**
 - 1.240.1 Available under license
- 1.241 libtasn 3.8**
 - 1.241.1 Available under license
- 1.242 libxi 1.7.4**
 - 1.242.1 Available under license
- 1.243 libxfont 1.5.1**
 - 1.243.1 Available under license
- 1.244 mesa 10.6.5**
 - 1.244.1 Available under license
- 1.245 nspr 4.11.0**
 - 1.245.1 Available under license
- 1.246 pam 1.1.8**
 - 1.246.1 Available under license

1.247 polkit 0.112

1.247.1 Available under license

1.248 selinux 2.0.22-1.el6

1.248.1 Available under license

1.249 shadow 4.1.5.1

1.249.1 Available under license

1.250 tevent 0.9.25

1.250.1 Available under license

1.251 libnss-nisplus 2.31

1.251.1 Available under license

1.252 libnss-nis 2.17

1.252.1 Available under license

1.253 network-manager 1.0.6-27.el7

1.253.1 Available under license

1.254 nss-pem 1.0.3-5.el7

1.254.1 Available under license

1.255 libasyns 0.8

1.255.1 Available under license

1.256 libev 4.15

1.256.1 Available under license

1.1 grub 0.97

1.1.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our

General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below,

refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but

does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source

code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot

distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software

Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program;
if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type 'show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type 'show c' for details.
```

The hypothetical commands 'show w' and 'show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than 'show w' and 'show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
```

```
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the

library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.2 curl 7.19.7

1.2.1 Available under license :

COPYRIGHT AND PERMISSION NOTICE

Copyright (c) 1996 - 2009, Daniel Stenberg, <daniel@haxx.se>.

All rights reserved.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT OF THIRD PARTY RIGHTS. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of a copyright holder shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization of the copyright holder.

1.3 dbus-python 0.83.0

1.3.1 Available under license :

As of version 0.82.4, dbus-python is released under the following permissive non-copyleft license (the same one used for D-Bus core):

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright holders and licensing are indicated in the source files.

1.4 lua 5.1.3

1.4.1 Available under license :

License for Lua 5.0 and later versions
Copyright 19942008 Lua.org, PUC-Rio.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.5 libjpeg 6b

1.5.1 Notifications :

This software is based in part on the work of the Independent JPEG Group.

1.5.2 Available under license :

The Independent JPEG Group's JPEG software

=====
README for release 6b of 27-Mar-1998
=====

This distribution contains the sixth public release of the Independent JPEG

Group's free JPEG software. You are welcome to redistribute this software and to use it for any purpose, subject to the conditions under LEGAL ISSUES, below.

Serious users of this software (particularly those incorporating it into larger programs) should contact IJG at jpeg-info@uunet.uu.net to be added to our electronic mailing list. Mailing list members are notified of updates and have a chance to participate in technical discussions, etc.

This software is the work of Tom Lane, Philip Gladstone, Jim Boucher, Lee Crocker, Julian Minguillon, Luis Ortiz, George Phillips, Davide Rossi, Guido Vollbeding, Ge' Weijers, and other members of the Independent JPEG Group.

IJG is not affiliated with the official ISO JPEG standards committee.

DOCUMENTATION

ROADMAP

=====

This file contains the following sections:

OVERVIEW General description of JPEG and the IJG software.
LEGAL ISSUES Copyright, lack of warranty, terms of distribution.
REFERENCES Where to learn more about JPEG.
ARCHIVE LOCATIONS Where to find newer versions of this software.
RELATED SOFTWARE Other stuff you should get.
FILE FORMAT WARS Software *not* to get.
TO DO Plans for future IJG releases.

Other documentation files in the distribution are:

User documentation:

install.doc How to configure and install the IJG software.
usage.doc Usage instructions for cjpeg, djpeg, jpegtran,
 rdjpgcom, and wrjpgcom.
*.1 Unix-style man pages for programs (same info as usage.doc).
wizard.doc Advanced usage instructions for JPEG wizards only.
change.log Version-to-version change highlights.

Programmer and internal

documentation:

libjpeg.doc How to use the JPEG library in your own programs.
example.c Sample code for calling the JPEG library.
structure.doc Overview of the JPEG library's internal structure.
filelist.doc Road map of IJG files.
coderrules.doc Coding style rules --- please read if you contribute code.

Please read at least the files install.doc and usage.doc. Useful information

can also be found in the JPEG FAQ (Frequently Asked Questions) article. See ARCHIVE LOCATIONS below to find out where to obtain the FAQ article.

If you want to understand how the JPEG code works, we suggest reading one or more of the REFERENCES, then looking at the documentation files (in roughly the order listed) before diving into the code.

OVERVIEW

=====

This package contains C software to implement JPEG image compression and decompression. JPEG (pronounced "jay-peg") is a standardized compression method for full-color and gray-scale images.

JPEG is intended for compressing "real-world" scenes; line drawings, cartoons and other non-realistic images are not its strong suit. JPEG is lossy, meaning that the output image is not exactly identical to the input image. Hence you must not use JPEG if you have to have identical output bits. However, on typical photographic images, very good compression levels can be obtained with no visible change, and remarkably high compression levels are possible if you can tolerate a low-quality image. For more details, see the references, or just experiment with various compression settings.

This software implements JPEG baseline, extended-sequential, and progressive compression processes. Provision is made for supporting all variants of these processes, although some uncommon parameter settings aren't implemented yet. For legal reasons, we are not distributing code for the arithmetic-coding variants of JPEG; see LEGAL ISSUES. We have made no provision for supporting the hierarchical or lossless processes defined in the standard.

We provide a set of library routines for reading and writing JPEG image files, plus two sample applications "cjpeg" and "djpeg", which use the library to perform conversion between JPEG and some other popular image file formats. The library is intended to be reused in other applications.

In order to support file conversion and viewing software, we have included considerable functionality beyond the bare JPEG coding/decoding capability; for example, the color quantization modules are not strictly part of JPEG decoding, but they are essential for output to colormapped file formats or colormapped displays. These extra functions can be compiled out of the library if not required for a particular application. We have also included "jpegtran", a utility for lossless transcoding between different JPEG processes, and "rdjpgcom" and "wrjpgcom", two simple applications for inserting and extracting textual comments in JFIF files.

The emphasis in designing this software has been on achieving portability and flexibility, while also making it fast enough to be useful. In particular, the software is not intended to be read as a tutorial on JPEG. (See the REFERENCES section for introductory material.) Rather, it is intended to be reliable, portable, industrial-strength code. We do not claim to have achieved that goal in every aspect of the software, but we strive for it.

We welcome the use of this software as a component of commercial products. No royalty is required, but we do ask for an acknowledgement in product documentation, as described under LEGAL ISSUES.

LEGAL ISSUES

=====

In plain English:

1. We don't promise that this software works. (But if you find any bugs, please let us know!)
2. You can use this software for whatever you want. You don't have to pay us.
3. You may not pretend that you wrote this software. If you use it in a program, you must acknowledge somewhere in your documentation that you've used the IJG code.

In legalese:

The authors make NO WARRANTY or representation, either express or implied, with respect to this software, its quality, accuracy, merchantability, or fitness for a particular purpose. This software is provided "AS IS", and you, its user, assume the entire risk as to its quality and accuracy.

This software is copyright (C) 1991-1998, Thomas G. Lane.
All Rights Reserved except as specified below.

Permission is hereby granted to use, copy, modify, and distribute this software (or portions thereof) for any purpose, without fee, subject to these conditions:

- (1) If any part of the source code for this software is distributed, then this README file must be included, with this copyright and no-warranty notice unaltered; and any additions, deletions, or changes to the original files must be clearly indicated in accompanying documentation.
- (2) If only executable code is distributed, then the accompanying documentation must state that "this software is based in part on the work of the Independent JPEG Group".
- (3) Permission for use of this software is granted only if the user accepts full responsibility for any undesirable consequences; the authors accept

NO LIABILITY for damages of any kind.

These conditions apply to any software derived from or based on the IJG code, not just to the unmodified library. If you use our work, you ought to acknowledge us.

Permission is NOT granted for the use of any IJG author's name or company name in advertising or publicity relating to this software or products derived from it. This software may be referred to only as "the Independent JPEG Group's software".

We specifically permit and encourage the use of this software as the basis of commercial products, provided that all warranty or liability claims are assumed by the product vendor.

ansi2knr.c is included in this distribution by permission of L. Peter Deutsch, sole proprietor of its copyright holder, Aladdin Enterprises of Menlo Park, CA. ansi2knr.c is NOT covered by the above copyright and conditions, but instead by the usual distribution terms of the Free Software Foundation; principally, that you must include source code if you redistribute it. (See the file ansi2knr.c for full details.) However, since ansi2knr.c is not needed as part of any program generated from the IJG code, this does not limit you more than the foregoing paragraphs do.

The Unix configuration script "configure" was produced with GNU Autoconf. It is copyright by the Free Software Foundation but is freely distributable. The same holds for its supporting scripts (config.guess, config.sub, ltconfig, ltmain.sh). Another support script, install-sh, is copyright by M.I.T. but is also freely distributable.

It appears that the arithmetic coding option of the JPEG spec is covered by patents owned by IBM, AT&T, and Mitsubishi. Hence arithmetic coding cannot legally be used without obtaining one or more licenses. For this reason, support for arithmetic coding has been removed from the free JPEG software. (Since arithmetic coding provides only a marginal gain over the unpatented Huffman mode, it is unlikely that very many implementations will support it.) So far as we are aware, there are no patent restrictions on the remaining code.

The IJG distribution formerly included code to read and write GIF files. To avoid entanglement with the Unisys LZW patent, GIF reading support has been removed altogether, and the GIF writer has been simplified to produce "uncompressed GIFs". This technique does not use the LZW algorithm; the resulting GIF files are larger than usual, but are readable by all standard GIF decoders.

We are required to state that

"The Graphics Interchange Format(c) is the Copyright property of CompuServe Incorporated. GIF(sm) is a Service Mark property of CompuServe Incorporated."

REFERENCES

=====

We

highly recommend reading one or more of these references before trying to understand the innards of the JPEG software.

The best short technical introduction to the JPEG compression algorithm is Wallace, Gregory K. "The JPEG Still Picture Compression Standard", Communications of the ACM, April 1991 (vol. 34 no. 4), pp. 30-44. (Adjacent articles in that issue discuss MPEG motion picture compression, applications of JPEG, and related topics.) If you don't have the CACM issue handy, a PostScript file containing a revised version of Wallace's article is available at <ftp://ftp.uu.net/graphics/jpeg/wallace.ps.gz>. The file (actually a preprint for an article that appeared in IEEE Trans. Consumer Electronics) omits the sample images that appeared in CACM, but it includes corrections and some added material. Note: the Wallace article is copyright ACM and IEEE, and it may not be used for commercial purposes.

A somewhat less technical, more

leisurely introduction to JPEG can be found in

"The Data Compression Book" by Mark Nelson and Jean-loup Gailly, published by M&T Books (New York), 2nd ed. 1996, ISBN 1-55851-434-1. This book provides good explanations and example C code for a multitude of compression methods including JPEG. It is an excellent source if you are comfortable reading C code but don't know much about data compression in general. The book's JPEG sample code is far from industrial-strength, but when you are ready to look at a full implementation, you've got one here...

The best full description of JPEG is the textbook "JPEG Still Image Data Compression Standard" by William B. Pennebaker and Joan L. Mitchell, published by Van Nostrand Reinhold, 1993, ISBN 0-442-01272-1. Price US\$59.95, 638 pp. The book includes the complete text of the ISO JPEG standards (DIS 10918-1 and draft DIS 10918-2). This is by far the most complete exposition of JPEG in existence, and we highly recommend it.

The

JPEG standard itself is not available electronically; you must order a paper copy through ISO or ITU. (Unless you feel a need to own a certified official copy, we recommend buying the Pennebaker and Mitchell book instead; it's much cheaper and includes a great deal of useful explanatory material.)

In the USA, copies of the standard may be ordered from ANSI Sales at (212) 642-4900, or from Global Engineering Documents at (800) 854-7179. (ANSI doesn't take credit card orders, but Global does.) It's not cheap: as of 1992, ANSI was charging \$95 for Part 1 and \$47 for Part 2, plus 7% shipping/handling. The standard is divided into two parts, Part 1 being the actual specification, while Part 2 covers compliance testing methods. Part 1 is titled "Digital Compression and Coding of Continuous-tone Still Images, Part 1: Requirements and guidelines" and has document numbers ISO/IEC IS 10918-1, ITU-T T.81. Part 2 is titled "Digital Compression and Coding of Continuous-tone Still Images, Part 2: Compliance testing" and has document numbers ISO/IEC IS 10918-2, ITU-T T.83.

Some extensions to the original JPEG standard are defined in JPEG Part 3, a newer ISO standard numbered ISO/IEC IS 10918-3 and ITU-T T.84. IJG currently does not support any Part 3 extensions.

The JPEG standard does not specify all details of an interchangeable file format. For the omitted details we follow the "JFIF" conventions, revision 1.02. A copy of the JFIF spec is available from:

Literature Department
C-Cube Microsystems, Inc.
1778 McCarthy Blvd.
Milpitas, CA 95035
phone (408) 944-6300, fax (408) 944-6314

A PostScript version of this document is available by FTP at <ftp://ftp.uu.net/graphics/jpeg/jfif.ps.gz>. There is also a plain text version at <ftp://ftp.uu.net/graphics/jpeg/jfif.txt.gz>, but it is missing the figures.

The TIFF 6.0 file format specification can be obtained by FTP from <ftp://ftp.sgi.com/graphics/tiff/TIFF6.ps.gz>. The JPEG incorporation scheme

found in the TIFF 6.0 spec of 3-June-92 has a number of serious problems. IJG does not recommend use of the TIFF 6.0 design (TIFF Compression tag 6). Instead, we recommend the JPEG design proposed by TIFF Technical Note #2 (Compression tag 7). Copies of this Note can be obtained from <ftp://ftp.sgi.com> or from <ftp://ftp.uu.net/graphics/jpeg/>. It is expected that the next revision of the TIFF spec will replace the 6.0 JPEG design with the Note's design. Although IJG's own code does not support TIFF/JPEG, the free libtiff library uses our library to implement TIFF/JPEG per the Note. libtiff is available from <ftp://ftp.sgi.com/graphics/tiff/>.

ARCHIVE LOCATIONS

=====

The "official" archive site for this software is [ftp.uu.net](ftp://ftp.uu.net) (Internet

address 192.48.96.9). The most recent released version can always be found there in directory graphics/jpeg. This particular version will be archived as ftp://ftp.uu.net/graphics/jpeg/jpegsrc.v6b.tar.gz. If you don't have direct Internet access, UUNET's archives are also available via UUCP; contact help@uunet.uu.net for information on retrieving files that way.

Numerous Internet sites maintain copies of the UUNET files. However, only ftp.uu.net is guaranteed to have the latest official version.

You can also obtain this software in DOS-compatible "zip" archive format from the SimTel archives (ftp://ftp.simtel.net/pub/simtelnet/msdos/graphics/), or on CompuServe in the Graphics Support forum (GO CIS:GRAPHSUP), library 12 "JPEG Tools". Again, these versions may sometimes lag behind the ftp.uu.net release.

The JPEG FAQ (Frequently Asked Questions) article is a useful source of general information about JPEG. It is updated constantly and therefore is not included in this distribution. The FAQ is posted every two weeks to Usenet newsgroups comp.graphics.misc, news.answers, and other groups. It is available on the World Wide Web at <http://www.faqs.org/faqs/jpeg-faq/> and other news.answers archive sites, including the official news.answers archive at rtfm.mit.edu: <ftp://rtfm.mit.edu/pub/usenet/news.answers/jpeg-faq/>. If you don't have Web or FTP access, send e-mail to mail-server@rtfm.mit.edu with body
send usenet/news.answers/jpeg-faq/part1
send usenet/news.answers/jpeg-faq/part2

RELATED SOFTWARE

=====

Numerous viewing and image manipulation programs now support JPEG. (Quite a few of them use this library to do so.) The JPEG FAQ described above lists some of the more popular free and shareware viewers, and tells where to obtain them on Internet.

If you are on a Unix machine, we highly recommend Jef Poskanzer's free PBPLUS software, which provides many useful operations on PPM-format image files. In particular, it can convert PPM images to and from a wide range of other formats, thus making cjpeg/djpeg considerably more useful. The latest version is distributed by the NetPBM group, and is available from numerous sites, notably <ftp://wuarchive.wustl.edu/graphics/graphics/packages/NetPBM/>. Unfortunately PBPLUS/NETPBM is not nearly as portable as the IJG software is; you are likely to have difficulty making it work on any non-Unix machine.

A different free JPEG implementation, written by the PVRG group at Stanford, is available from <ftp://havefun.stanford.edu/pub/jpeg/>. This program is designed for research and experimentation rather than production use; it is slower, harder to use, and less portable than the IJG code, but it is easier to read and modify. Also, the PVRG code supports lossless JPEG, which we do not. (On the other hand, it doesn't do progressive JPEG.)

FILE FORMAT WARS

=====

Some JPEG programs produce files that are not compatible with our library. The root of the problem is that the ISO JPEG committee failed to specify a concrete file format. Some vendors "filled in the blanks" on their own, creating proprietary formats that no one else could read.

(For example, none of the early commercial JPEG implementations for the Macintosh were able to exchange compressed files.)

The file format we have adopted is called JFIF (see REFERENCES). This format has been agreed to by a number of major commercial JPEG vendors, and it has become the de facto standard. JFIF is a minimal or "low end" representation. We recommend the use of TIFF/JPEG (TIFF revision 6.0 as modified by TIFF Technical Note #2) for "high end" applications that need to record a lot of additional data about an image. TIFF/JPEG is fairly new and not yet widely supported, unfortunately.

The upcoming JPEG Part 3 standard defines a file format called SPIFF. SPIFF is interoperable with JFIF, in the sense that most JFIF decoders should be able to read the most common variant of SPIFF. SPIFF has some technical advantages over JFIF, but its major claim to fame is simply that it is an official standard rather than an informal one. At this point it is unclear whether

SPIFF will supersede JFIF or whether JFIF will remain the de-facto standard. IJG intends to support SPIFF once the standard is frozen, but we have not decided whether it should become our default output format or not. (In any case, our decoder will remain capable of reading JFIF indefinitely.)

Various proprietary file formats incorporating JPEG compression also exist. We have little or no sympathy for the existence of these formats. Indeed, one of the original reasons for developing this free software was to help force convergence on common, open format standards for JPEG files. Don't use a proprietary file format!

TO DO

=====

The major thrust for v7 will probably be improvement of visual quality. The current method for scaling the quantization tables is known not to be very good at low Q values. We also intend to investigate block boundary smoothing, "poor man's variable quantization", and other means of improving quality-vs-file-size performance without sacrificing compatibility.

In future versions, we are considering supporting some of the upcoming JPEG Part 3 extensions --- principally, variable quantization and the SPIFF file format.

As always, speeding things up is of great interest.

Please send bug reports, offers of help, etc. to jpeg-info@uunet.uu.net.

1.6 dhcp 4.1.1

1.6.1 Available under license :

```
# Copyright (c) 2004-2010 by Internet Systems Consortium, Inc. ("ISC")
# Copyright (c) 1995-2003 by Internet Software Consortium
#
# Permission to use, copy, modify, and distribute this software for any
# purpose with or without fee is hereby granted, provided that the above
# copyright notice and this permission notice appear in all copies.
#
# THE SOFTWARE IS PROVIDED "AS IS" AND ISC DISCLAIMS ALL WARRANTIES
# WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF
# MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL ISC BE LIABLE FOR
# ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES
# WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN
# ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT
# OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.
#
# Internet Systems Consortium, Inc.
# 950 Charter Street
# Redwood City, CA 94063
# <info@isc.org>
# https://www.isc.org/
```

1.7 openssl 1.0.0

1.7.1 Notifications :

This product includes software developed by the OpenSSL Project for use in the OpenSSL Toolkit (<http://www.openssl.org/>)

This product includes cryptographic software written by Eric Young (ey@cryptsoft.com).

This product includes software written by Tim Hudson (tjh@cryptsoft.com).

1.7.2 Available under license :

LICENSE ISSUES

=====

The OpenSSL toolkit stays under a dual license, i.e. both the conditions of the OpenSSL License and the original SSLeay license apply to the toolkit. See below for the actual license texts. Actually both licenses are BSD-style Open Source licenses. In case of any license issues related to OpenSSL please contact openssl-core@openssl.org.

OpenSSL License

/* =====

- * Copyright (c) 1998-2008 The OpenSSL Project. All rights reserved.
- *
- * Redistribution and use in source and binary forms, with or without
- * modification, are permitted provided that the following conditions
- * are met:
- *
- * 1. Redistributions of source code must retain the above copyright
- * notice, this list of conditions and the following disclaimer.
- *
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer in
- * the documentation and/or other materials provided with the
- * distribution.
- *
- * 3. All advertising materials mentioning features or use of this
- * software must display the following acknowledgment:
- * "This product includes software developed by the OpenSSL Project
- * for use in the OpenSSL Toolkit. (<http://www.openssl.org/>)"
- *
- * 4. The names "OpenSSL Toolkit" and "OpenSSL Project" must not be used to
- * endorse or promote products derived from this software without
- * prior written permission. For written permission, please contact
- * openssl-core@openssl.org.
- *
- * 5. Products derived from this software may not be called "OpenSSL"
- * nor may "OpenSSL" appear in their names without prior written
- * permission of the OpenSSL Project.
- *
- * 6. Redistributions of any form whatsoever must retain the following
- * acknowledgment:
- *
- * "This product includes software developed by the OpenSSL Project
- * for use in the OpenSSL Toolkit (<http://www.openssl.org/>)"

*
* THIS SOFTWARE IS PROVIDED BY THE OpenSSL PROJECT "AS IS" AND ANY
* EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR
* PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OpenSSL PROJECT OR
* ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
* SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT
* NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES;
* LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT,
* STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
* ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED
* OF THE POSSIBILITY OF SUCH DAMAGE.

* =====

*
* This product includes cryptographic software written by Eric Young
* (eay@cryptsoft.com). This product includes software written by Tim
* Hudson (tjh@cryptsoft.com).
*
*/

Original SSLeay License

/* Copyright (C) 1995-1998 Eric Young (eay@cryptsoft.com)
* All rights reserved.
*
* This package is an SSL implementation written
* by Eric Young (eay@cryptsoft.com).
* The implementation was written so as to conform with Netscapes SSL.
*
* This library is free for commercial and non-commercial use as long as
* the following conditions are adhered to. The following conditions
* apply to all code found in this distribution, be it the RC4, RSA,
* lhash, DES, etc., code; not just the SSL code. The SSL documentation
* included with this distribution is covered by the same copyright terms
* except that the holder is Tim Hudson (tjh@cryptsoft.com).
*
* Copyright remains Eric Young's, and as such any Copyright notices in
* the code are not to be removed.
* If this package is used in a product, Eric Young should be given attribution
* as the author of the parts of the library used.
* This can be in the form of a textual message at program startup or
* in documentation (online or textual) provided with the package.
*
* Redistribution and use in source and binary forms, with or without

- * modification, are permitted provided that the following conditions
- * are met:
- * 1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * 3. All advertising materials mentioning features or use of this software must display the following acknowledgement:
 - * "This product includes cryptographic software written by Eric Young (eay@cryptsoft.com)"
 - * The word 'cryptographic' can be left out if the routines from the library being used are not cryptographic related :-).
- * 4. If you include any Windows specific code (or a derivative thereof) from the apps directory (application code) you must include an acknowledgement:
 - * "This product includes software written by Tim Hudson (tjh@cryptsoft.com)"
- * THIS SOFTWARE IS PROVIDED BY ERIC YOUNG "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.
- * The licence and distribution terms for any publically available version or derivative of this code cannot be changed. i.e. this code cannot simply be copied and put under another distribution licence [including the GNU Public Licence.]

*/
 Copyright (C) 1995-1997 Eric Young (eay@cryptsoft.com)
 All rights reserved.

This package is an Blowfish implementation written by Eric Young (eay@cryptsoft.com).

This library is free for commercial and non-commercial use as long as the following conditions are adhered to. The following conditions apply to all code found in this distribution.

Copyright remains Eric Young's, and as such any Copyright notices in the code are not to be removed.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgement:
This product includes software developed by Eric Young (eay@cryptsoft.com)

THIS SOFTWARE IS PROVIDED BY ERIC YOUNG "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The license and distribution terms for any publically available version or derivative of this code cannot be changed.

i.e. this code cannot simply be copied and put under another distribution license [including the GNU Public License.]

The reason behind this being stated in this direct manner is past experience in code simply being copied and the attribution removed from it and then being distributed as part of other packages. This implementation was a non-trivial and unpaid effort.

Copyright (C) 1995-1997 Eric Young (eay@cryptsoft.com)
All rights reserved.

This package is an DES implementation written by Eric Young (eay@cryptsoft.com).
The implementation was written so as to conform with MIT's libdes.

This library is free for commercial and non-commercial use as long as the following conditions are adhered to. The following conditions apply to all code found in this distribution.

Copyright remains Eric Young's, and as such any Copyright notices in the code are not to be removed.

If this package is used in a product, Eric Young should be given attribution as the author of that the SSL library. This can be in the form of a textual message at program startup or in documentation (online or textual) provided with the package.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgement:
This product includes software developed by Eric Young (eay@cryptsoft.com)

THIS SOFTWARE IS PROVIDED BY ERIC YOUNG "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The license and distribution terms for any publically available version or derivative of this code cannot be changed. i.e. this code cannot simply be copied and put under another distribution license [including the GNU Public License.]

The reason behind this being stated in this direct manner is past experience in code simply being copied and the attribution removed from it and then being distributed as part of other packages. This implementation was a non-trivial and unpaid effort.

1.8 tar 1.26

1.8.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If

such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying,

distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source

includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your

work need not make them do so.

A compilation

of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no

further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction

is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or

- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could

give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the

patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this

License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR

PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT

UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short
notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type 'show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type 'show c' for details.
```

The hypothetical commands 'show w' and 'show c' should show the appropriate
parts of
the General Public License. Of course, your program's commands
might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school,
if any, to sign a "copyright disclaimer" for the program, if necessary.
For more information on this, and how to apply and follow the GNU GPL, see
<http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program
into proprietary programs. If your program is a subroutine library, you
may consider it more useful to permit linking proprietary applications with
the library. If this is what you want to do, use the GNU Lesser General
Public License instead of this License. But first, please read
<http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.9 gdb 7.6.1

1.9.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts

as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know

that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of

free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language.

(Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based

on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library,

and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to

distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library".

The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference

directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license

restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other

library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you

do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse

you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system

which is

implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library

specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision

will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting

redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston,

MA 02110-1301, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!
GNU LESSER GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

This version of the GNU Lesser General Public License incorporates the terms and conditions of version 3 of the GNU General Public License, supplemented by the additional permissions listed below.

0. Additional Definitions.

As used herein, "this License" refers to version 3 of the GNU Lesser General Public License, and the "GNU GPL" refers to version 3 of the GNU General Public License.

"The Library" refers to a covered work governed by this License, other than an Application or a Combined Work as defined below.

An "Application" is any work that makes use of an interface provided by the Library, but which is not otherwise based on the Library. Defining a subclass of a class defined by the Library is deemed a mode of using an interface provided by the Library.

A "Combined Work" is a work produced by combining or linking an Application with the Library. The particular version of the Library with which the Combined Work was made is also called the "Linked Version".

The "Minimal Corresponding Source" for a Combined Work means the Corresponding Source for the Combined Work, excluding any source code for portions of the Combined Work that, considered in isolation, are based on the Application, and not on the Linked Version.

The "Corresponding Application Code" for a Combined Work means the object code and/or source code for the Application, including any data and utility programs needed for reproducing the Combined Work from the Application, but excluding the System Libraries of the Combined Work.

1. Exception to Section 3 of the GNU GPL.

You may convey a covered work under sections 3 and 4 of this License without being bound by section 3 of the GNU GPL.

2. Conveying Modified Versions.

If you modify a copy of the Library, and, in your modifications, a facility refers to a function or data to be supplied by an Application

that uses the facility (other than as an argument passed when the facility is invoked), then you may convey a copy of the modified version:

- a) under this License, provided that you make a good faith effort to ensure that, in the event an Application does not supply the function or data, the facility still operates, and performs whatever part of its purpose remains meaningful, or
- b) under the GNU GPL, with none of the additional permissions of this License applicable to that copy.

3. Object Code Incorporating Material from Library Header Files.

The object code form of an Application may incorporate material from a header file that is part of the Library. You may convey such object code under terms of your choice, provided that, if the incorporated material is not limited to numerical parameters, data structure layouts and accessors, or small macros, inline functions and templates (ten or fewer lines in length), you do both of the following:

- a) Give prominent notice with each copy of the object code that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the object code with a copy of the GNU GPL and this license document.

4. Combined Works.

You may convey a Combined Work under terms of your choice that, taken together, effectively do not restrict modification of the portions of the Library contained in the Combined Work and reverse engineering for debugging such modifications, if you also do each of the following:

- a) Give prominent notice with each copy of the Combined Work that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the Combined Work with a copy of the GNU GPL and this license document.
- c) For a Combined Work that displays copyright notices during execution, include the copyright notice for the Library among these notices, as well as a reference directing the user to the

copies of the GNU GPL and this license document.

d) Do one of the following:

0) Convey the Minimal Corresponding Source under the terms of this License, and the Corresponding Application Code in a form suitable for, and under terms that permit, the user to recombine or relink the Application with a modified version of the Linked Version to produce a modified Combined Work, in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.

1) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (a) uses at run time a copy of the Library already present on the user's computer system, and (b) will operate properly with a modified version of the Library that is interface-compatible with the Linked Version.

e) Provide Installation Information, but only if you would otherwise be required to provide such information under section 6 of the GNU GPL, and only to the extent that such information is necessary to install and execute a modified version of the Combined Work produced by recombining or relinking the Application with a modified version of the Linked Version. (If you use option 4d0, the Installation Information must accompany the Minimal Corresponding Source and Corresponding Application Code. If you use option 4d1, you must provide the Installation Information in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.)

5. Combined Libraries.

You may place library facilities that are a work based on the Library side by side in a single library together with other library facilities that are not Applications and are not covered by this License, and convey such a combined library under terms of your choice, if you do both of the following:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities, conveyed under the terms of this License.

b) Give prominent notice with the combined library that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

6. Revised Versions of the GNU Lesser General Public License.

The Free Software Foundation may publish revised and/or new versions of the GNU Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library as you received it specifies that a certain numbered version of the GNU Lesser General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that published version or of any later version published by the Free Software Foundation. If the Library as you received it does not specify a version number of the GNU Lesser General Public License, you may choose any version of the GNU Lesser General Public License ever published by the Free Software Foundation.

If the Library as you received it specifies that a proxy can decide whether future versions of the GNU Lesser General Public License shall apply, that proxy's public statement of acceptance of any version is permanent authorization for you to choose that version for the Library.

NOTE! This copyright does **not** cover user programs that use kernel services by normal system calls - this is merely considered normal use of the kernel, and does **not** fall under the heading of "derived work". Also note that the GPL below is copyrighted by the Free Software Foundation, but the instance of code that it refers to (the Linux kernel) is copyrighted by me and others who actually wrote it.

Also note that the only valid version of the GPL as far as the kernel is concerned is `_this_` particular version of the license (ie v2, not v2.2 or v3.x or whatever), unless explicitly otherwise stated.

Linus Torvalds

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To

protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to

say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third

parties under the terms of this License.

- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be

distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface

definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to

these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for
software and other kinds of works.

The licenses for most software and other practical works are designed
to take away your freedom to share and change the works. By contrast,
the GNU General Public License is intended to guarantee your freedom to
share and change all versions of a program--to make sure it remains free
software for all its users. We, the Free Software Foundation, use the
GNU General Public License for most of our software; it applies also to
any other work released this way by its authors. You can apply it to
your programs, too.

When we speak of free software, we are referring to freedom, not
price.

Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
them if you wish), that you receive source code or can get it if you
want it, that you can change the software or use pieces of it in new
free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you
these rights or asking you to surrender the rights. Therefore, you have
certain responsibilities if you distribute copies of the software, or if
you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether
gratis or for a fee, you must pass on to the recipients the same

freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and

"recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that

Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs

which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License

only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of

your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section

7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no

more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods,

procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of

it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing

of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting

any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF

ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright  
(C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.10 libxtst 1.2.2

1.10.1 Available under license :

Copyright 1990, 1991 by UniSoft Group Limited
Copyright 1992, 1993, 1995, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from The Open Group.

Copyright 1995 Network Computing Devices

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Network Computing Devices not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

NETWORK COMPUTING DEVICES DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL NETWORK COMPUTING DEVICES BE LIABLE FOR ANY SPECIAL,

INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES
WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN
AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING
OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 2005 Red Hat, Inc.

Permission to use, copy, modify, distribute, and sell this software and its
documentation for any purpose is hereby granted without fee, provided that
the above copyright notice appear in all copies and that both that
copyright notice and this permission notice appear in supporting
documentation, and that the name of Red Hat not be used in
advertising or publicity pertaining to distribution of the software without
specific, written prior permission. Red Hat makes no
representations about the suitability of this software for any purpose. It
is provided "as is" without express or implied warranty.

RED HAT DISCLAIMS ALL WARRANTIES
WITH REGARD TO THIS SOFTWARE,
INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO
EVENT SHALL RED HAT BE LIABLE FOR ANY SPECIAL, INDIRECT OR
CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE,
DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER
TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR
PERFORMANCE OF THIS SOFTWARE.

Copyright 1992 by UniSoft Group Ltd.

Permission to use, copy, modify, and distribute this documentation for
any purpose and without fee is hereby granted, provided that the above
copyright notice and this permission notice appear in all copies.
UniSoft makes no representations about the suitability for any purpose of
the information in this document. This documentation is provided "as is"
without express or implied warranty.

Copyright
1992, 1994, 1995 X Consortium

Permission is hereby granted, free of charge, to any person obtaining a
copy of this software and associated documentation files (the "Software"),
to deal in the Software without restriction, including without limitation
the rights to use, copy, modify, merge, publish, distribute, sublicense,

and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the X Consortium shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the X Consortium.

Copyright 1994 Network Computing Devices, Inc.

Permission to use, copy, modify, distribute, and sell this documentation for any purpose is hereby granted without fee, provided that the above copyright notice and this permission notice appear in all copies. Network Computing Devices, Inc. makes no representations about the suitability for any purpose of the information in this document. This documentation is provided "as is" without express or implied warranty.

1.11 cpio 2.11

1.11.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we

stand ready to extend this provision to those domains
in future versions
of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate

Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding

Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content,

constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users'

Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and

its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the

Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information

does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or

- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not

impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that

country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed

under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License

along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>
This program comes with
ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.12 dmidecode 3.5

1.12.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This

General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price.

Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a

notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such

an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues),

conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For

example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any

later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively

convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute  
it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into

proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.13 coreutils 8.22

1.13.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they

know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and

"recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A

"Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section

4 to

"keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no

more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods,

procedures, authorization

keys, or other information required to install

and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of

it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting

any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.14 bash 4.1.2

1.14.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute

and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such

parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through

any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands `show w'
and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Lesser General
Public License instead of this License.

GNU Free Documentation License
Version 1.3, 3 November 2008

Copyright (C) 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.
<<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

0. PREAMBLE

The purpose of this License is to make a manual, textbook, or other
functional and useful document "free" in the sense of freedom: to
assure everyone the effective freedom to copy and redistribute it,
with or without modifying it, either commercially or noncommercially.
Secondarily, this License preserves for the author and publisher a way
to get credit for their work, while not being considered responsible
for modifications made by others.

This License is a kind of "copyleft", which means that derivative
works of the document must themselves be free in the same sense. It

complements the GNU General Public License, which is a copyleft license designed for free software.

We

have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

1. APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The "Document", below, refers to any such manual or work. Any member of the public is a licensee, and is addressed as "you". You accept the license if you copy,

modify or distribute the work in a way requiring permission under copyright law.

A "Modified Version" of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A "Secondary Section" is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The "Invariant Sections" are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant

Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not "Transparent" is called "Opaque".

Examples of suitable formats for Transparent copies include plain ASCII without markup, Texinfo input format, LaTeX input format, SGML or XML using a publicly available DTD, and standard-conforming simple HTML, PostScript or PDF designed for human modification. Examples of transparent image formats include PNG, XCF and JPG. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, SGML or XML for which the DTD and/or processing tools are not generally available, and the machine-generated HTML, PostScript or PDF produced by some word processors for output purposes only.

The "Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, "Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The "publisher" means any person or entity that distributes copies of the Document to the public.

A section "Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as "Acknowledgements", "Dedications", "Endorsements", or "History".) To "Preserve the Title"

of such a section when you modify the Document means that it remains a section "Entitled XYZ" according to this definition.

The

Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

2. VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

3. COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition. Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

4. MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

- A. Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.
- B. List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.
- C. State on the Title page the name of the publisher of the Modified Version, as the publisher.
- D. Preserve all the copyright notices of the Document.
- E. Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.
- F. Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the

- terms of this License, in the form shown in the Addendum below.
- G. Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.
 - H. Include an unaltered copy of this License.
 - I. Preserve the section Entitled "History", Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled "History" in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.
 - J. Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the "History" section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.
 - K. For any section Entitled "Acknowledgements" or "Dedications", Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.
 - L. Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.
 - M. Delete any section Entitled "Endorsements". Such a section may not be included in the Modified Version.
 - N. Do not retitle any existing section to be Entitled "Endorsements" or to conflict in title with any Invariant Section.
 - O. Preserve any Warranty Disclaimers.

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled "Endorsements", provided it contains nothing but endorsements of your Modified Version by various parties--for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a

passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

5. COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled "History" in the various original documents, forming one section Entitled "History"; likewise combine any sections Entitled "Acknowledgements", and any sections Entitled "Dedications". You must delete all sections Entitled "Endorsements".

6. COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all

other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

7. AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an "aggregate" if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

8. TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4.

Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled "Acknowledgements", "Dedications", or "History", the requirement (section 4) to Preserve

its Title (section 1) will typically require changing the actual title.

9. TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this

License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

10. FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See <http://www.gnu.org/copyleft/>.

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version

number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

11. RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

"CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

"Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is "eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

Copyright (c) YEAR YOUR NAME.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation;

with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts.
A copy of the license is included in the section entitled "GNU
Free Documentation License".

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts,
replace the "with...Texts." line with this:

with the Invariant Sections being LIST THEIR TITLES, with the
Front-Cover Texts being LIST, and with the Back-Cover Texts being LIST.

If you have Invariant Sections without Cover Texts, or some other
combination of the three, merge those two alternatives to suit the
situation.

If your document contains nontrivial examples of program code, we
recommend releasing these examples in parallel under your choice of
free software license, such as the GNU General Public License,
to permit their use in free software.

@c The GNU Free Documentation License.

@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,

@c hence no sectioning command or @node.

@display

Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.

@uref{http://fsf.org/}

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other
functional and useful document @dfn{free} in the sense of freedom: to
assure everyone the effective freedom to copy and redistribute it,
with or without modifying it, either commercially or noncommercially.
Secondarily, this License preserves for the author and publisher a way
to get credit for their work, while not being considered responsible
for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative
works of the document

must themselves be free in the same sense. It

complements the GNU General Public License, which is a copyleft

license designed for free software.

We have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The ``Document'', below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as ``you''. You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A ``Modified Version'' of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A ``Secondary Section'' is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The ``Invariant Sections'' are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not "Transparent" is called "Opaque".

Examples of suitable formats for Transparent copies include plain @sc{ascii} without markup, Texinfo input format, LaTeX input format, @acronym{SGML} or @acronym{XML} using a publicly available @acronym{DTD}, and standard-conforming simple @acronym{HTML}, PostScript or @acronym{PDF} designed for human modification. Examples of transparent image formats include @acronym{PNG}, @acronym{XCF} and @acronym{JPG}. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, @acronym{SGML} or @acronym{XML} for which the @acronym{DTD} and/or processing tools are not generally available, and the machine-generated @acronym{HTML}, PostScript or @acronym{PDF} produced by some word processors for output purposes only.

The "Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, "Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The "publisher" means any person or entity that distributes copies of the Document to the public.

A section "Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as "Acknowledgements",

``Dedications'', ``Endorsements'', or ``History''.) To ``Preserve the Title'' of such a section when you modify the Document means that it remains a section ``Entitled XYZ'' according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible.

You may add other material on the covers in addition.

Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent

pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material.

If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that

this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions

(which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the

Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements'' or ``Dedications'', Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements''. Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements'' or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements'', provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History" in the various original documents, forming one section Entitled ``History"; likewise combine any sections Entitled ``Acknowledgements", and any sections Entitled ``Dedications". You must delete all sections Entitled ``Endorsements."

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an ``aggregate" if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves

derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See [@uref{http://www.gnu.org/copyleft/}](http://www.gnu.org/copyleft/).

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

``CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

``Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is ``eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

@smallexample

@group

Copyright (C) @var{year} @var{your name}.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled ``GNU Free Documentation License".

@end group

@end smallexample

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the ``with@dots{ }Texts." line with this:

@smallexample

@group

with the Invariant Sections being @var{list their titles}, with

```
the Front-Cover
Texts being @var{list}, and with the Back-Cover Texts
being @var{list}.
@end group
@end smallexample
```

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

```
@c Local Variables:
@c ispell-local-pdict: "ispell-dict"
@c End:
```

```
GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007
```

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you

these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose

of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a

written offer, valid for at least three years

and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status

of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent

that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms

of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However,

nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily

for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program

into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>. Unless otherwise stated, all files in this directory are Copyright (C) 1991,1992,1993,1994,1995,1996,1997,1998,1999,2000,2001,2002,2003, 2004,2005,2006,2007,2008,2009,2010,2011 Free Software Foundation, Inc.

See the file COPYING in the bash distribution root directory for copying and usage restrictions.

The file ifs-posix.tests is Copyright (C) 2005 Glen Fowler.

1.15 atk 1.28.0

1.15.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in

a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a

portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility

is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6,

whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major

components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the

original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new

versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year>  
<name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

```
<signature of Ty Coon>, 1 April 1990  
Ty Coon, President of Vice
```

That's all there is to it!

1.16 xfsprogs 3.1.1

1.16.1 Available under license :

This package was debianized by Nathan Scott nathans@debian.org on Sun, 19 Nov 2000 07:37:09 -0500.

It can be downloaded from <ftp://oss.sgi.com/projects/xfs/download/>

Copyright:

Copyright (c) 2000-2002 Silicon Graphics, Inc. All Rights Reserved.

You are free to distribute this software under the terms of the GNU General Public License.

On Debian systems, the complete text of the GNU General Public License can be found in `/usr/share/common-licenses/GPL` file.

The library named "libhandle" is licensed under Version 2.1 of the GNU Lesser General Public License.

On Debian systems, refer to `/usr/share/common-licenses/LGPL-2.1` for the complete text of the GNU Lesser General Public License.

The library named "libhandle" and some specific header files (including `<xfs/xfs.h>`) are licensed under the GNU Lesser General Public License.

All other components are licensed under the GNU General Public License.

<<http://www.fsf.org/copyleft/lesser.txt>>

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public

Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a

restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an

appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must

be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote

it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work

of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under

Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined

library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.
- b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you

may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free

programs

whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

<<http://www.fsf.org/copyleft/gpl.txt>>

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish),
that you receive source code or can get it
if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands
that there is no warranty for this free
software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all

third

parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when

you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be

distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from

the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version 2 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but  
WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program; if not, write to the Free Software  
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
```

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your

school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

<<http://www.fsf.org/copyleft/gpl.txt>>

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of

running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you

distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and

of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH

HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.17 parted 3.1

1.17.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains

that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than

the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to

control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological

measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not

invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or

specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may

not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an

organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not

impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone

to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this

License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY

APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>
This program comes with ABSOLUTELY
NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.
@c The GNU Free Documentation License.
@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,
@c hence no sectioning command or @node.

@display
Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.

@uref{http://fsf.org/}

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other functional and useful document @dfn{free} in the sense of freedom: to assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative works of the document must themselves be free in the same sense. It complements the GNU General Public License, which is a copyleft license designed for free software.

We have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The ``Document'', below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as ``you''. You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A ``Modified Version'' of the Document means any work containing the Document or a portion of it, either copied verbatim, or with

modifications and/or translated into another language.

A "Secondary Section" is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The "Invariant Sections" are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not "Transparent" is called "Opaque".

Examples of suitable formats for Transparent copies include plain ASCII without markup, Texinfo input format, LaTeX input format, SGML or XML using a publicly available DTD, and standard-conforming simple HTML, PostScript or PDF designed for human modification. Examples of transparent image formats include PNG, XCF and JPG. Opaque formats include proprietary formats that can be

read and edited only by proprietary word processors, SGML or XML for which the DTD and/or processing tools are not generally available, and the machine-generated HTML, PostScript or PDF produced by some word processors for output purposes only.

The "Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, "Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The "publisher" means any person or entity that distributes copies of the Document to the public.

A section "Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as "Acknowledgements", "Dedications", "Endorsements", or "History".) To "Preserve the Title" of such a section when you modify the Document means that it remains a section "Entitled XYZ" according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and

you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition. Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified

Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If

there is no section Entitled ``History" in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History" section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements" or ``Dedications", Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements". Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements" or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant

Sections in the Modified Version's license notice.

These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements", provided it contains nothing but endorsements of your Modified Version by various

parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number.

Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History" in the various original documents, forming one section Entitled ``History"; likewise combine any sections Entitled ``Acknowledgements", and any sections Entitled ``Dedications". You must delete all sections Entitled ``Endorsements."

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an "aggregate" if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form.

Otherwise they must appear on printed covers that bracket the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See @uref{<http://www.gnu.org/copyleft/>}.

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License ``or any later version'' applies to it, you have the option of

following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

``Massive Multiauthor Collaboration Site" (or ``MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A ``Massive Multiauthor Collaboration" (or ``MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

``CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

``Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is ``eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License

in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

```
@smallexample
@group
Copyright (C) @var{year} @var{your name}.
Permission is granted to copy, distribute and/or modify this document
under the terms of the GNU Free Documentation License, Version 1.3
or any later version published by the Free Software Foundation;
with no Invariant Sections, no Front-Cover Texts, and no Back-Cover
Texts. A copy of the license is included in the section entitled ``GNU
Free Documentation License".
@end group
@end smallexample
```

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the ``with@dots{ }Texts."@: line with this:

```
@smallexample
@group
with the Invariant Sections being @var{list their titles}, with
the Front-Cover Texts being @var{list}, and with the Back-Cover Texts
being @var{list}.
@end group
@end smallexample
```

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

```
@c Local Variables:
@c ispell-local-pdict: "ispell-dict"
@c End:
```

1.18 sshpass 1.05

1.18.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices

stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying

the Program or works based on it.

6. Each

time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License

may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may

be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.19 ethtool 2.6

1.19.1 Available under license :

ethtool is available under the terms of the GNU Public License version 2.

See COPYING for details.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed

to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it,

either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to

control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.20 rsyslog 7.4.7

1.20.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

This version of the GNU Lesser General Public License incorporates
the terms and conditions of version 3 of the GNU General Public
License, supplemented by the additional permissions listed below.

0. Additional Definitions.

As used herein, "this License" refers to version 3 of the GNU Lesser
General Public License, and the "GNU GPL" refers to version 3 of the GNU
General Public License.

"The Library" refers to a covered work governed by this License,
other than an Application or a Combined Work as defined below.

An "Application" is any work that makes use of an interface provided
by the Library, but which is not otherwise based on the Library.
Defining a subclass of a class defined by the Library is
deemed a mode
of using an interface provided by the Library.

A "Combined Work" is a work produced by combining or linking an
Application with the Library. The particular version of the Library
with which the Combined Work was made is also called the "Linked
Version".

The "Minimal Corresponding Source" for a Combined Work means the
Corresponding Source for the Combined Work, excluding any source code
for portions of the Combined Work that, considered in isolation, are
based on the Application, and not on the Linked Version.

The "Corresponding Application Code" for a Combined Work means the
object code and/or source code for the Application, including any data
and utility programs needed for reproducing the Combined Work from the
Application, but excluding the System Libraries of the Combined Work.

1. Exception to Section 3 of the GNU GPL.

You may convey a covered work under sections 3 and 4 of this License without being bound by section 3 of the GNU GPL.

2. Conveying

Modified Versions.

If you modify a copy of the Library, and, in your modifications, a facility refers to a function or data to be supplied by an Application that uses the facility (other than as an argument passed when the facility is invoked), then you may convey a copy of the modified version:

- a) under this License, provided that you make a good faith effort to ensure that, in the event an Application does not supply the function or data, the facility still operates, and performs whatever part of its purpose remains meaningful, or
- b) under the GNU GPL, with none of the additional permissions of this License applicable to that copy.

3. Object Code Incorporating Material from Library Header Files.

The object code form of an Application may incorporate material from a header file that is part of the Library. You may convey such object code under terms of your choice, provided that, if the incorporated material is not limited to numerical parameters, data structure layouts and accessors, or small macros, inline functions and templates (ten or fewer lines in length), you do both of the following:

- a) Give prominent notice with each copy of the object code that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the object code with a copy of the GNU GPL and this license document.

4. Combined Works.

You may convey a Combined Work under terms of your choice that, taken together, effectively do not restrict modification of the portions of the Library contained in the Combined Work and reverse engineering for debugging such modifications, if you also do each of the following:

- a) Give prominent notice with each copy of the Combined Work that the Library is used in it and that the Library and its use are

covered by this License.

b) Accompany the Combined Work with a copy of the GNU GPL and this license document.

c) For a Combined Work that displays copyright notices during execution, include the copyright notice for the Library among these notices, as well as a reference directing the user to the copies of the GNU GPL and this license document.

d) Do one of the following:

0) Convey the Minimal Corresponding Source under the terms of this License, and the Corresponding Application Code in a form suitable for, and under terms that permit, the user to recombine or relink the Application with a modified version of the Linked Version to produce a modified Combined Work, in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.

1) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (a) uses at run time a copy of the Library already present on the user's computer system, and (b) will operate properly with a modified version of the Library that is interface-compatible with the Linked Version.

e) Provide Installation Information, but only if you would otherwise be required to provide such information under section 6 of the GNU GPL, and only to the extent that such information is necessary to install and execute a modified version of the Combined Work produced by recombining or relinking the Application with a modified version of the Linked Version. (If you use option 4d0, the Installation Information must accompany the Minimal Corresponding Source and Corresponding Application Code. If you use option 4d1, you must provide the Installation Information in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.)

5. Combined Libraries.

You may place library facilities that are a work based on the Library side by side in a single library together with other library facilities that are not Applications and are not covered by this License, and convey such a combined library under

terms of your
choice, if you do both of the following:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities, conveyed under the terms of this License.
- b) Give prominent notice with the combined library that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

6. Revised Versions of the GNU Lesser General Public License.

The Free Software Foundation may publish revised and/or new versions of the GNU Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library as you received it specifies that a certain numbered version of the GNU Lesser General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that published version or of any later version published by the Free Software Foundation. If the Library as you received it does not specify a version number of the GNU Lesser General Public License, you may choose any version of the GNU Lesser General Public License ever published by the Free Software Foundation.

If the Library as you received it specifies that a proxy can decide whether future versions of the GNU Lesser General Public License shall apply, that proxy's public statement of acceptance of any version is permanent authorization for you to choose that version for the Library.

GNU GENERAL PUBLIC LICENSE Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast,

the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2)

tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that

same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you

receive it, in any medium, provided that you conspicuously and appropriately
publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other

parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.
- e) Convey the object code using peer-to-peer transmission, provided

you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and

protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions.

Additional permissions that are applicable to the entire Program shall

be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright

holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10.

Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered

work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF

SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software: you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation, either version 3 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program. If not, see <http://www.gnu.org/licenses/>.
```

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary.

For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do,

use the GNU Lesser General

Public License instead of this License. But first, please read

<<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not

price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new

free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert

copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready

to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of

interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not

convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the

terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate"

if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a

written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status

of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they

were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this

License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However,

nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily

for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published

by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <<http://www.gnu.org/licenses/>>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with

ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first,

please read

<<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

Apache License

Version 2.0, January 2004

<http://www.apache.org/licenses/>

TERMS AND CONDITIONS FOR USE, REPRODUCTION, AND DISTRIBUTION

1. Definitions.

"License" shall mean the terms and conditions for use, reproduction, and distribution as defined by Sections 1 through 9 of this document.

"Licensor" shall mean the copyright owner or entity authorized by the copyright owner that is granting the License.

"Legal Entity" shall mean the union of the acting entity and all other entities that control, are controlled by, or are under common control with that entity. For the purposes of this definition, "control" means (i) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (ii) ownership of fifty percent (50%) or more of the outstanding shares, or (iii) beneficial ownership of such entity.

"You" (or "Your") shall mean an individual or Legal Entity exercising permissions granted by this License.

"Source" form shall mean

the preferred form for making modifications, including but not limited to software source code, documentation source, and configuration files.

"Object" form shall mean any form resulting from mechanical transformation or translation of a Source form, including but not limited to compiled object code, generated documentation, and conversions to other media types.

"Work" shall mean the work of authorship, whether in Source or Object form, made available under the License, as indicated by a copyright notice that is included in or attached to the work (an example is provided in the Appendix below).

"Derivative Works" shall mean any work, whether in Source or Object form, that is based on (or derived from) the Work and for which the editorial revisions, annotations, elaborations, or other modifications represent, as a whole, an original work of authorship. For the purposes of this License, Derivative Works shall not include works that remain separable from, or merely link (or bind by name) to the interfaces of, the Work and Derivative Works thereof.

"Contribution" shall mean any work of authorship, including the original version of the Work and any modifications or additions to that Work or Derivative Works thereof, that is intentionally submitted to Licensor for inclusion in the

Work by the copyright owner or by an individual or Legal Entity authorized to submit on behalf of the copyright owner. For the purposes of this definition, "submitted" means any form of electronic, verbal, or written communication sent to the Licensor or its representatives, including but not limited to communication on electronic mailing lists, source code control systems, and issue tracking systems that are managed by, or on behalf of, the Licensor for the purpose of discussing and improving the Work, but excluding communication that is conspicuously marked or otherwise designated in writing by the copyright owner as "Not a Contribution."

"Contributor" shall mean Licensor and any individual or Legal Entity on behalf of whom a Contribution has been received by Licensor and subsequently incorporated within the Work.

2. Grant of Copyright License. Subject to the terms and conditions of this License, each Contributor hereby grants to You a perpetual, worldwide, non-exclusive, no-charge, royalty-free, irrevocable copyright license to reproduce, prepare Derivative Works of, publicly display, publicly perform, sublicense, and distribute the Work and such Derivative Works in Source or Object form.

3. Grant of Patent License. Subject to the terms and conditions of this License, each Contributor hereby grants to You a perpetual, worldwide, non-exclusive, no-charge, royalty-free, irrevocable (except as stated in this section) patent license to make, have made, use, offer to sell, sell, import, and otherwise transfer the Work, where such license applies only to those patent claims licensable by such Contributor that are necessarily infringed by their Contribution(s) alone or by combination of their Contribution(s) with the Work to which such Contribution(s) was submitted. If You institute patent litigation against any entity (including a cross-claim or counterclaim in a lawsuit) alleging that the Work or a Contribution incorporated within the Work constitutes direct or contributory patent infringement, then any patent licenses granted to You under this License for that Work shall terminate as of the date such litigation is filed.

4. Redistribution. You may reproduce and distribute copies of the Work or Derivative Works thereof in any medium, with or without modifications, and in Source or Object form, provided that You meet the following conditions:

1. You must give any other recipients of the Work or Derivative Works a copy of this License; and
2. You must cause any modified files to carry prominent notices stating that You changed the files; and
3. You must retain, in the Source form of any Derivative Works that You distribute, all copyright, patent, trademark, and attribution notices from the Source form of the Work, excluding those notices that do not pertain to any part of the Derivative Works; and
4. If the Work includes a "NOTICE" text file as part of its distribution, then any Derivative Works that You distribute must include a readable copy of the attribution notices contained within such NOTICE file, excluding those notices that do not pertain to any part of the Derivative Works, in at least one of the following places: within a NOTICE text file distributed as part of the Derivative Works; within the Source form or documentation, if provided along with the Derivative Works; or, within a display generated by the Derivative Works, if and wherever such third-party notices normally appear. The contents of the NOTICE file are for informational purposes only and do not modify the License. You may add Your own attribution notices within Derivative Works that You distribute, alongside or as an addendum to the NOTICE text from the Work, provided that such additional attribution notices cannot be construed as modifying the License. You may add Your own copyright statement to Your modifications and may provide additional or different license terms and conditions for use, reproduction, or distribution of Your modifications, or for any such Derivative Works as a whole, provided Your use, reproduction, and distribution of the Work otherwise complies with the conditions stated in this License.

5. Submission of Contributions. Unless You explicitly state otherwise, any Contribution intentionally submitted for inclusion in the Work by You to the Licensor shall be under the terms and conditions of this License, without any additional terms or conditions. Notwithstanding the above, nothing herein shall supersede or modify the terms of any separate license agreement you may have executed with Licensor regarding such Contributions.

6. Trademarks. This License does not grant permission to use the trade names, trademarks, service marks, or product names of the Licensor, except as required for reasonable and customary use in describing the origin of the Work and reproducing the content of the NOTICE file.

7. Disclaimer of Warranty. Unless required by applicable law or agreed to in writing, Licensor provides the Work (and each Contributor provides its Contributions) on an "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied, including, without limitation, any warranties or conditions of TITLE, NON-INFRINGEMENT, MERCHANTABILITY, or FITNESS FOR A PARTICULAR PURPOSE. You are solely responsible for determining the appropriateness of using or redistributing the Work and assume any risks associated with Your exercise of permissions under this License.

8. Limitation of Liability. In no event and under no legal theory, whether in tort (including negligence), contract, or otherwise, unless required by applicable law (such as deliberate and grossly negligent acts) or agreed to in writing, shall any Contributor be liable to You for damages, including any direct, indirect, special, incidental, or consequential damages of any character arising as a result of this License or out of the use or inability to use the Work (including but not limited to damages for loss of goodwill, work stoppage, computer failure or malfunction, or any and all other commercial damages or losses), even if such Contributor has been advised of the possibility of such damages.

9. Accepting Warranty or Additional Liability. While redistributing the Work or Derivative Works thereof, You may choose to offer, and charge a fee for, acceptance of support, warranty, indemnity, or other liability obligations and/or rights consistent with this License. However, in accepting such obligations, You may act only on Your own behalf and on Your sole responsibility, not on behalf of any other Contributor, and only if You agree to indemnify, defend, and hold each Contributor harmless for any liability incurred by, or claims asserted against, such Contributor by reason of your accepting any such warranty or additional liability.

1.21 d-bus 1.2.24

1.21.1 Available under license :

D-Bus is licensed to you under your choice of the Academic Free License version 2.1, or the GNU General Public License version 2 (or, at your option any later version).

Both licenses are included here. Some of the standalone binaries are under the GPL only; in particular, but not limited to, tools/dbus-cleanup-sockets.c and test/decode-gcov.c. Each source code file is marked with the proper copyright information - if you find a file that isn't marked please bring it to our attention.

The Academic Free License

This Academic Free License (the "License") applies to any original work of authorship (the "Original Work") whose owner (the "Licensor") has placed the following notice immediately following the copyright notice for the Original Work:

Licensed under the Academic Free License version 2.1

1) Grant of Copyright License. Licensor hereby grants You a world-wide, royalty-free, non-exclusive, perpetual, sublicenseable license to do the following:

a) to reproduce the Original Work in copies;

b) to prepare derivative works ("Derivative Works") based upon the Original Work;

c) to distribute copies of the Original Work and Derivative Works to the public;

d) to perform the Original Work publicly; and

e) to display the Original Work publicly.

2) Grant of Patent License. Licensor hereby grants You a world-wide, royalty-free, non-exclusive, perpetual, sublicenseable license, under patent claims owned or controlled by the Licensor that are embodied in the Original Work as furnished by the Licensor, to make, use, sell and offer for sale the Original Work and Derivative Works.

3) Grant of Source Code License. The term "Source Code" means the preferred form of the Original Work for making modifications to it and all available documentation describing how to modify the Original Work. Licensor hereby agrees to provide a machine-readable copy of the Source Code of the Original Work along with each copy of the Original Work that Licensor distributes. Licensor reserves the right to satisfy this obligation by placing a machine-readable copy of the Source Code in an information repository reasonably calculated to permit inexpensive and convenient access by You for as long as Licensor continues to distribute the Original Work, and by publishing the address of that information repository in a notice immediately following the copyright notice that applies to the Original Work.

4) Exclusions From License Grant. Neither the names of Licensor, nor the names of any contributors to the Original Work, nor any of their trademarks or service marks, may be used to endorse or promote products derived from this Original Work without express prior written permission of the Licensor. Nothing in this License shall be deemed to

grant any rights to trademarks, copyrights, patents, trade secrets or any other intellectual property of Licensor except as expressly stated herein. No patent license is granted to make, use, sell or offer to sell embodiments of any patent claims other than the licensed claims defined in Section 2. No right is granted to the trademarks of Licensor even if such marks are included in the Original Work. Nothing in this License shall be interpreted to prohibit Licensor from licensing under different terms from this License any Original Work that Licensor otherwise would have a right to license.

5) This section intentionally omitted.

6) Attribution Rights. You must retain, in the Source Code of any Derivative Works that You create, all copyright, patent or trademark notices from the Source Code of the Original Work, as well as any notices of licensing and any descriptive text identified therein as an "Attribution Notice." You must cause the Source Code for any Derivative Works that You create to carry a prominent Attribution Notice reasonably calculated to inform recipients that You have modified the Original Work.

7) Warranty of Provenance and Disclaimer of Warranty. Licensor warrants that the copyright in and to the Original Work and the patent rights granted herein by Licensor are owned by the Licensor or are sublicensed to You under the terms of this License with the permission of the contributor(s) of those copyrights and patent rights. Except as expressly stated in the immediately preceding sentence, the Original Work is provided under this License on an "AS IS" BASIS and WITHOUT WARRANTY, either express or implied, including, without limitation, the warranties of NON-INFRINGEMENT, MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY OF THE ORIGINAL WORK IS WITH YOU. This DISCLAIMER OF WARRANTY constitutes an essential part of this License. No license to Original Work is granted hereunder except under this disclaimer.

8) Limitation of Liability. Under no circumstances and under no legal theory, whether in tort (including negligence), contract, or otherwise, shall the Licensor be liable to any person for any direct, indirect, special, incidental, or consequential damages of any character arising as a result of this License or the use of the Original Work including, without limitation, damages for loss of goodwill, work stoppage, computer failure or malfunction, or any and all other commercial damages or losses. This limitation of liability shall not apply to liability for death or personal injury resulting from Licensor's negligence to the extent applicable law prohibits such

limitation. Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, so this exclusion and limitation may not apply to You.

9) Acceptance and Termination. If You distribute copies of the Original Work or a Derivative Work, You must make a reasonable effort under the circumstances to obtain the express assent of recipients to the terms of this License. Nothing else but this License (or another written agreement between Licensor and You) grants You permission to create Derivative Works based upon the Original Work or to exercise any of the rights granted in Section 1 herein, and any attempt to do so except under the terms of this License (or another written agreement between Licensor and You) is expressly prohibited by U.S. copyright law, the equivalent laws of other countries, and by international treaty. Therefore, by exercising any of the rights granted to You in Section 1 herein, You indicate Your acceptance of this License and all of its terms and conditions.

10) Termination for Patent Action. This License shall terminate automatically and You may no longer exercise any of the rights granted to You by this License as of the date You commence an action, including a cross-claim or counterclaim, against Licensor or any licensee alleging that the Original Work infringes a patent. This termination provision shall not apply for an action alleging patent infringement by combinations of the Original Work with other software or hardware.

11) Jurisdiction, Venue and Governing Law. Any action or suit relating to this License may be brought only in the courts of a jurisdiction wherein the Licensor resides or in which Licensor conducts its primary business, and under the laws of that jurisdiction excluding its conflict-of-law provisions. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded. Any use of the Original Work outside the scope of this License or after its termination shall be subject to the requirements and penalties of the U.S. Copyright Act, 17 U.S.C. 101 et seq., the equivalent laws of other countries, and international treaty. This section shall survive the termination of this License.

12) Attorneys Fees. In any action to enforce the terms of this License or seeking damages relating thereto, the prevailing party shall be entitled to recover its costs and expenses, including, without limitation, reasonable attorneys' fees and costs incurred in connection with such action, including any appeal of such action. This section

shall survive the termination of this License.

13) Miscellaneous. This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable.

14) Definition of "You" in This License. "You" throughout this License, whether in upper or lower case, means an individual or a legal entity exercising rights under, and complying with all of the terms of, this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with you. For purposes of this definition, "control" means (i) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (ii) ownership of fifty percent (50%) or more of the outstanding shares, or (iii) beneficial ownership of such entity.

15) Right to Use. You may use the Original Work in all ways not otherwise restricted or conditioned by this License or by law, and Licensor promises not to interfere with or be responsible for such uses by You.

This license is Copyright (C) 2003-2004 Lawrence E. Rosen. All rights reserved. Permission is hereby granted to copy and distribute this license without modification. This license may not be modified without the express written permission of its copyright owner.

--

END OF ACADEMIC FREE LICENSE. The following is intended to describe the essential differences between the Academic Free License (AFL) version 1.0 and other open source licenses:

The Academic Free License is similar to the BSD, MIT, UoI/NCSA and Apache licenses in many respects but it is intended to solve a few problems with those licenses.

* The AFL is written so as to make it clear what software is being licensed (by the inclusion of a statement following the copyright notice in the software). This way, the license functions better than a template license. The BSD, MIT and UoI/NCSA licenses apply to unidentified software.

* The AFL contains a complete copyright grant to the software. The BSD and Apache licenses are vague and incomplete in that respect.

* The AFL contains a complete patent grant to the software. The BSD, MIT, UoI/NCSA and Apache licenses rely on an implied patent license and contain no explicit patent grant.

* The AFL makes it clear that no trademark rights are granted to the licensor's trademarks. The Apache license contains such a provision, but the BSD, MIT and UoI/NCSA licenses do not.

* The AFL includes the warranty by the licensor that it either owns the copyright or that it is distributing the software under a license. None of the other licenses contain that warranty. All other warranties are disclaimed, as is the case for the other licenses.

* The AFL is itself copyrighted (with the right granted to copy and distribute without modification). This ensures that the owner of the copyright to the

license will control changes. The Apache license contains a copyright notice, but the BSD, MIT and UoI/NCSA licenses do not.

--

START OF GNU GENERAL PUBLIC LICENSE

--

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program,

and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the

operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License

and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to

refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes

make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software;
you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by
the Free Software Foundation; either version 2 of the License, or

(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details  
type `show w'.
```

```
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
```

```
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful

to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.22 gir1.2-gdkpixbuf-2.0 2.16.0

1.23 libxcb 1.11

1.23.1 Available under license :

Copyright (C) 2001-2006 Bart Massey, Jamey Sharp, and Josh Triplett.
All Rights Reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS

BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the names of the authors or their institutions shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the authors.

1.24 glibc 2.12

1.24.1 Available under license :

This work may be reproduced and distributed in whole or in part, in any medium, physical or electronic, so as long as this copyright notice remains intact and unchanged on all copies. Commercial redistribution is permitted and encouraged, but you may not redistribute, in whole or in part, under terms more restrictive than those under which you received it. If you redistribute a modified or translated version of this work, you must also make the source code to the modified or translated version available in electronic form without charge. However, mere aggregation as part of a larger work shall not count as a modification for this purpose.

All code examples in this work are placed into the public domain, and may be used, modified and redistributed without restriction.

BECAUSE THIS WORK IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE WORK, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE WORK "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. SHOULD THE WORK PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY REPAIR OR CORRECTION.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE WORK AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE WORK, EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

PCRE LICENCE

Please see the file LICENCE in the PCRE distribution for licensing details.

End

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making

changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while

preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based

on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If

identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to

distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the

copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined

library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not

distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free

programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

1.25 pixman 0.32.6

1.25.1 Available under license :

The following is the MIT license, agreed upon by most contributors. Copyright holders of new code should use this license statement where possible. They may also add themselves to the list below.

/*

- * Copyright 1987, 1988, 1989, 1998 The Open Group
- * Copyright 1987, 1988, 1989 Digital Equipment Corporation
- * Copyright 1999, 2004, 2008 Keith Packard
- * Copyright 2000 SuSE, Inc.
- * Copyright 2000 Keith Packard, member of The XFree86 Project, Inc.

- * Copyright 2004, 2005, 2007, 2008, 2009, 2010 Red Hat, Inc.
- * Copyright 2004 Nicholas Miell
- * Copyright 2005 Lars Knoll & Zack Rusin, Trolltech
- * Copyright 2005 Trolltech AS
- * Copyright 2007 Luca Barbato
- * Copyright 2008 Aaron Plattner, NVIDIA Corporation
- * Copyright 2008 Rodrigo Kumpera
- * Copyright 2008 Andr Tupinamb
- * Copyright 2008 Mozilla Corporation
- * Copyright 2008 Frederic Plourde
- * Copyright 2009, Oracle and/or its affiliates. All rights reserved.
- * Copyright 2009, 2010 Nokia Corporation
- *
- * Permission is hereby granted,
free of charge, to any person obtaining a
- * copy of this software and associated documentation files (the "Software"),
- * to deal in the Software without restriction, including without limitation
- * the rights to use, copy, modify, merge, publish, distribute, sublicense,
- * and/or sell copies of the Software, and to permit persons to whom the
- * Software is furnished to do so, subject to the following conditions:
- *
- * The above copyright notice and this permission notice (including the next
- * paragraph) shall be included in all copies or substantial portions of the
- * Software.
- *
- * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
- * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
- * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
- * THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
- * LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
- * FROM, OUT OF OR IN
- CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
- * DEALINGS IN THE SOFTWARE.
- */

1.26 audit 2.2-2.e16

1.26.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third

parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium

customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to

these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions

of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.27 dbus-glib 0.86-6.el6

1.27.1 Available under license :

The D-Bus glib bindings are licensed to you under your choice of the Academic
Free License version 2.1, or the GNU General Public License version 2. Both
licenses are included here. Some of the standalone binaries are under the GPL
only; in particular, but not limited to, tests/decode-gcov.c. Each source code
file is marked with the proper copyright information.

The Academic Free License
v. 2.1

This Academic Free License (the "License") applies to any original work of authorship (the "Original Work") whose
owner (the "Licensor") has placed the following notice immediately following the copyright notice for the Original
Work:

Licensed under the Academic Free License version 2.1

- 1) Grant of Copyright License. Licensor hereby grants You a
world-wide, royalty-free, non-exclusive, perpetual, sublicenseable
license to do the following:
 - a) to reproduce the Original Work in copies;
 - b) to prepare derivative works ("Derivative Works") based upon the Original Work;
 - c) to distribute copies
of the Original Work and Derivative Works to the public;
 - d) to perform the Original Work publicly; and
 - e) to display the Original Work publicly.

2) Grant of Patent License. Licensor hereby grants You a world-wide, royalty-free, non-exclusive, perpetual, sublicenseable license, under patent claims owned or controlled by the Licensor that are embodied in the Original Work as furnished by the Licensor, to make, use, sell and offer for sale the Original Work and Derivative Works.

3) Grant of Source Code License. The term "Source Code" means the preferred form of the Original Work for making modifications to it and all available documentation describing how to modify the Original Work. Licensor hereby agrees to provide a machine-readable copy of the Source Code of the Original Work along with each copy of the Original Work that Licensor distributes. Licensor reserves the right to satisfy this obligation by placing a machine-readable copy of the Source Code in an information repository reasonably calculated to permit inexpensive and convenient access by You for as long as Licensor continues to distribute the Original Work, and by publishing the address of that information repository in a notice immediately following the copyright notice that applies to the Original Work.

4) Exclusions From License Grant. Neither the names of Licensor, nor the names of any contributors to the Original Work, nor any of their trademarks or service marks, may be used to endorse or promote products derived from this Original Work without express prior written permission of the Licensor. Nothing in this License shall be deemed to grant any rights to trademarks, copyrights, patents, trade secrets or any other intellectual property of Licensor except as expressly stated herein. No patent license is granted to make, use, sell or offer to sell embodiments of any patent claims other than the licensed claims defined in Section 2. No right is granted to the trademarks of Licensor even if such marks are included in the Original Work. Nothing in this License shall be interpreted to prohibit Licensor from licensing under different terms from this License any Original Work that Licensor otherwise would have a right to license.

5) This section intentionally omitted.

6) Attribution Rights. You must retain, in the Source Code of any Derivative Works that You create, all copyright, patent or trademark notices from the Source Code of the Original Work, as well as any notices of licensing and any descriptive text identified therein as an "Attribution Notice." You must cause the Source Code for any Derivative Works that You create to carry a prominent Attribution Notice reasonably calculated to inform recipients that You have modified the Original Work.

7) Warranty of Provenance and Disclaimer of Warranty. Licensor warrants that the copyright in and to the Original Work and the patent rights granted herein by Licensor are owned by the Licensor or are sublicensed to You under the terms of this License with the permission of the contributor(s) of those copyrights and patent rights. Except as expressly stated in the immediately preceding sentence, the Original Work is provided under this License on an "AS IS" BASIS and WITHOUT WARRANTY, either express or implied, including, without limitation, the warranties of NON-INFRINGEMENT, MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY OF THE ORIGINAL WORK IS WITH YOU. This DISCLAIMER OF WARRANTY constitutes an essential part of this License. No license to Original Work is granted hereunder except under this disclaimer.

8) Limitation of Liability. Under no circumstances and under no legal theory, whether in tort (including negligence), contract, or otherwise, shall the Licensor be liable to any person for any direct, indirect, special, incidental, or consequential damages of any character arising as a result of this License or the use of the Original Work including, without limitation, damages for loss of goodwill, work stoppage, computer failure or malfunction, or any and all other commercial damages or losses. This limitation of liability shall not apply to liability for death or personal injury resulting from Licensor's negligence to the extent applicable law prohibits such limitation. Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, so this exclusion and limitation may not apply to You.

9) Acceptance and Termination. If You distribute copies of the Original Work or a Derivative Work, You must make a reasonable effort under the circumstances to obtain the express assent of recipients to the terms of this License. Nothing else but this License (or another written agreement between Licensor and You) grants You permission to create Derivative Works based upon the Original Work or to exercise any of the rights granted in Section 1 herein, and any attempt to do so except under the terms of this License (or another written agreement between Licensor and You) is expressly prohibited by U.S. copyright law, the equivalent laws of other countries, and by international treaty. Therefore, by exercising any of the rights granted to You in Section 1 herein, You indicate Your acceptance of this License and all of its terms and conditions.

10) Termination for Patent Action. This License shall terminate automatically and You may no longer exercise any of the rights granted to You by this License as of the date You commence an action,

including a cross-claim or counterclaim, against Licensor or any licensee alleging that the Original Work infringes a patent. This termination provision shall not apply for an action alleging patent infringement by combinations of the Original Work with other software or hardware.

11) Jurisdiction, Venue and Governing Law. Any action or suit relating to this License may be brought only in the courts of a jurisdiction wherein the Licensor resides or in which Licensor conducts its primary business, and under the laws of that jurisdiction excluding its conflict-of-law provisions. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded. Any use of the Original Work outside the scope of this License or after its termination shall be subject to the requirements and penalties of the U.S. Copyright Act, 17 U.S.C. 101 et seq., the equivalent laws of other countries, and international treaty. This section shall survive the termination of this License.

12) Attorneys Fees. In any action to enforce the terms of this License or seeking damages relating thereto, the prevailing party shall be entitled to recover its costs and expenses, including, without limitation, reasonable attorneys' fees and costs incurred in connection with such action, including any appeal of such action. This section shall survive the termination of this License.

13) Miscellaneous. This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable.

14) Definition of "You" in This License. "You" throughout this License, whether in upper or lower case, means an individual or a legal entity exercising rights under, and complying with all of the terms of, this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with you. For purposes of this definition, "control" means (i) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (ii) ownership of fifty percent (50%) or more of the outstanding shares, or (iii) beneficial ownership of such entity.

15) Right to Use. You may use the Original Work in all ways not otherwise restricted or conditioned by this License or by law, and Licensor promises not to interfere with or be responsible for such uses by You.

This license is Copyright (C) 2003-2004 Lawrence E. Rosen. All rights reserved. Permission is hereby granted to copy and distribute this license without modification. This license may not be modified without the express written permission of its copyright owner.

--

END OF ACADEMIC FREE LICENSE. The following is intended to describe the essential differences between the Academic Free License (AFL) version 1.0 and other open source licenses:

The Academic Free License is similar to the BSD, MIT, UoI/NCSA and Apache licenses in many respects but it is intended to solve a few problems with those licenses.

* The AFL is written so as to make it clear what software is being licensed (by the inclusion of a statement following the copyright notice in the software). This way, the license functions better than a template license. The BSD, MIT and UoI/NCSA licenses apply to unidentified software.

* The AFL contains a complete copyright grant to the software. The BSD and Apache licenses are vague and incomplete in that respect.

* The AFL contains a complete patent grant to the software. The BSD, MIT, UoI/NCSA and Apache licenses rely on an implied patent license and contain no explicit patent grant.

* The AFL makes it clear that no trademark rights are granted to the licensor's trademarks. The Apache license contains such a provision, but the BSD, MIT and UoI/NCSA licenses do not.

* The AFL includes the warranty by the licensor that it either owns the copyright or that it is distributing the software under a license. None of the other licenses contain that warranty. All other warranties are disclaimed, as is the case for the other licenses.

* The AFL is itself copyrighted (with the right granted to copy and distribute without modification). This ensures that the owner of the copyright to the license will control changes. The Apache license contains a copyright notice, but the BSD, MIT and UoI/NCSA licenses do not.

--

START OF GNU GENERAL PUBLIC LICENSE

--

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so

that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0.

This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1

above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You

may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by

modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED

TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it under certain conditions; type `show

c' for details.

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public

License instead of this License.

1.28 cyrus-sasl 2.1.23

1.28.1 Available under license :

```
/* CMU libsasl
 * Tim Martin
 * Rob Earhart
 * Rob Siemborski
 */
/*
 * Copyright (c) 1998-2003 Carnegie Mellon University. All rights reserved.
 *
 * Redistribution and use in source and binary forms, with or without
 * modification, are permitted provided that the following conditions
 * are met:
 *
 * 1. Redistributions of source code must retain the above copyright
 * notice, this list of conditions and the following disclaimer.
 *
 * 2. Redistributions in binary form must reproduce the above copyright
 * notice, this list of conditions and the following disclaimer in
 * the documentation and/or other materials provided with the
 * distribution.
 *
```

* 3. The name "Carnegie Mellon University" must not be used to
 * endorse or promote products derived from this software without
 * prior written permission. For permission or any other legal
 * details, please contact
 * Office of Technology Transfer
 * Carnegie Mellon University
 * 5000 Forbes Avenue
 * Pittsburgh, PA 15213-3890
 * (412) 268-4387, fax: (412) 268-7395
 * tech-transfer@andrew.cmu.edu
 *

* 4. Redistributions of any form whatsoever must retain the following
 * acknowledgment:
 * "This product includes software developed by Computing Services
 * at Carnegie Mellon University (<http://www.cmu.edu/computing/>)."
 *

* CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO
 * THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY
 * AND FITNESS, IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE
 * FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES
 * WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN
 * AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING
 * OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.
 */

/* CMU libasnl
 * Tim Martin
 * Rob Earhart
 * Rob Siemborski
 */

/*
 * Copyright (c) 2001 Carnegie Mellon University. All rights reserved.
 *
 * Redistribution and use in source and binary forms, with or without
 * modification, are permitted provided that the following conditions
 * are met:
 *
 * 1. Redistributions of source code must retain the above copyright
 * notice, this list of conditions and the following disclaimer.
 *
 * 2. Redistributions in binary form must reproduce the above copyright
 * notice, this list of conditions and the following disclaimer in
 * the documentation and/or other materials provided with the
 * distribution.
 *
 * 3. The name "Carnegie Mellon University" must not be used to
 * endorse or promote products derived from this software without
 * prior written permission. For permission or any other legal
 * details, please contact

* Office of Technology Transfer
* Carnegie Mellon University
* 5000 Forbes Avenue
* Pittsburgh, PA 15213-3890
* (412) 268-4387, fax: (412) 268-7395
* tech-transfer@andrew.cmu.edu
*

* 4. Redistributions of any form whatsoever must retain the following
* acknowledgment:
* "This product includes software developed by Computing Services
* at Carnegie Mellon University (<http://www.cmu.edu/computing/>)."
*

* CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO
* THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY
* AND FITNESS, IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE
* FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES
* WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN
* AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING
* OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.
*/

Copyright (C) 1995-1997 Eric Young (eay@mincom.oz.au)
All rights reserved.

This package is an DES implementation written by Eric Young (eay@mincom.oz.au).
The implementation was written so as to conform with MIT's libdes.

This library is free for commercial and non-commercial use as long as
the following conditions are adhered to. The following conditions
apply to all code found in this distribution.

Copyright remains Eric Young's, and as such any Copyright notices in
the code are not to be removed.

If this package is used in a product, Eric Young should be given attribution
as the author of that the SSL library. This can be in the form of a textual
message at program startup or in documentation (online or textual) provided
with the package.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the copyright
notice, this list of conditions and the
following disclaimer.
2. Redistributions in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in the
documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software
must display the following acknowledgement:

This product includes software developed by Eric Young (eay@mincom.oz.au)

THIS SOFTWARE IS PROVIDED BY ERIC YOUNG ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The license and distribution terms for any publically available version or derivative of this code cannot be changed. i.e. this code cannot simply be copied and put under another distribution license [including the GNU Public License.]

The reason behind this being stated in this direct manner is past experience in code simply being copied and the attribution removed from it and then being distributed as part of other packages. This implementation was a non-trivial and unpaid effort.

APPLE PUBLIC SOURCE LICENSE

Version 1.1 - April 19,1999

Please read this License carefully before downloading this software. By downloading and using this software, you are agreeing to be bound by the terms of this License. If you do not or cannot agree to the terms of this License, please do not download or use the software.

1. General; Definitions. This License applies to any program or other work which Apple Computer, Inc. ("Apple") publicly announces as subject to this Apple Public Source License and which contains a notice placed by Apple identifying such program or work as "Original Code" and stating that it is subject to the terms of this Apple Public Source License version 1.1 (or subsequent version thereof), as it may be revised from time to time by Apple ("License"). As used in this License:

1.1 "Affected Original Code" means only those specific portions of Original Code that allegedly infringe upon any party's intellectual property rights or are otherwise the subject of a claim of infringement.

1.2 "Applicable Patent Rights" mean: (a) in the case where Apple is

the grantor of rights, (i) claims of patents that are now or hereafter acquired, owned by or assigned to Apple and (ii) that cover subject matter contained in the Original Code, but only to the extent necessary to use, reproduce and/or distribute the Original Code without infringement; and (b) in the case where You are the grantor of rights, (i) claims of patents that are now or hereafter acquired, owned by or assigned to You and (ii) that cover subject matter in Your Modifications, taken alone or in combination with Original Code.

1.3 "Covered Code" means the Original Code, Modifications, the combination of Original Code and any Modifications, and/or any respective portions thereof.

1.4 "Deploy" means to use, sublicense or distribute Covered Code other than for Your internal research and development (R&D), and includes without limitation, any and all internal use or distribution of Covered Code within Your business or organization except for R&D use, as well as direct or indirect sublicensing or distribution of Covered Code by You to any third party in any form or manner.

1.5 "Larger Work" means a work which combines Covered Code or portions thereof with code not governed by the terms of this License.

1.6 "Modifications" mean any addition to, deletion from, and/or change to, the substance and/or structure of Covered Code. When code is released as a series of files, a Modification is: (a) any addition to or deletion from the contents of a file containing Covered Code; and/or (b) any new file or other representation of computer program statements that contains any part of Covered Code.

1.7 "Original Code" means (a) the Source Code of a program or other work as originally made available by Apple under this License, including the Source Code of any updates or upgrades to such programs or works made available by Apple under this License, and that has been expressly identified by Apple as such in the header file(s) of such work; and (b) the object code compiled from such Source Code and originally made available by Apple under this License.

1.8 "Source Code" means the human readable form of a program or other work that is suitable for making modifications to it, including all modules it contains, plus any associated interface definition files, scripts used to control compilation and installation of an executable (object code).

1.9 "You" or "Your" means an individual or a legal entity exercising rights under this License. For legal entities, "You" or "Your"

includes any entity which controls, is controlled by, or is under common control with, You, where "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of fifty percent (50%) or more of the outstanding shares or beneficial ownership of such entity.

2. Permitted Uses; Conditions & Restrictions. Subject to the terms

and conditions of this License, Apple hereby grants You, effective on the date You accept this License and download the Original Code, a world-wide, royalty-free, non-exclusive license, to the extent of Apple's Applicable Patent Rights and copyrights covering the Original Code, to do the following:

2.1 You may use, copy, modify and distribute Original Code, with or without Modifications, solely for Your internal research and development, provided that You must in each instance:

(a) retain and reproduce in all copies of Original Code the copyright and other proprietary notices and disclaimers of Apple as they appear in the Original Code, and keep intact all notices in the Original Code that refer to this License;

(b) include a copy of this License with every copy of Source Code of Covered Code and documentation You distribute, and You may not offer or impose any terms on such Source Code that alter or restrict this License or the recipients' rights hereunder, except as permitted under Section 6; and

(c) completely and accurately document all Modifications that you have made and the date of each such Modification, designate the version of the Original Code you used, prominently include a file carrying such information with the Modifications, and duplicate the notice in Exhibit A in each file of the Source Code of all such Modifications.

2.2 You may Deploy Covered Code, provided that You must in each instance:

(a) satisfy all the conditions of Section 2.1 with respect to the Source Code of the Covered Code;

(b) make all Your Deployed Modifications publicly available in Source Code form via electronic distribution (e.g. download from a web site) under the terms of this License and subject to the license grants set forth in Section 3 below, and any additional terms You may choose to offer under Section 6. You must continue to make the Source Code of

Your Deployed Modifications available for as long as you Deploy the Covered Code or twelve (12) months from the date of initial Deployment, whichever is longer;

(c) if You Deploy Covered Code containing Modifications made by You, inform others of how to obtain those Modifications by filling out and submitting the information found at <http://www.apple.com/publicsource/modifications.html>, if available; and

(d) if You Deploy Covered Code in object code, executable form only, include a prominent notice, in the code itself as well as in related documentation, stating that Source Code of the Covered Code is available under the terms of this License with information on how and where to obtain such Source Code.

3. Your Grants. In consideration of, and as a condition to, the licenses granted to You under this License:

(a) You hereby grant to Apple and all third parties a non-exclusive, royalty-free license, under Your Applicable Patent Rights and other intellectual property rights owned or controlled by You, to use, reproduce, modify, distribute and Deploy Your Modifications of the same scope and extent as Apple's licenses under Sections 2.1 and 2.2; and

(b) You hereby grant to Apple and its subsidiaries a non-exclusive, worldwide, royalty-free, perpetual and irrevocable license, under Your Applicable Patent Rights and other intellectual property rights owned or controlled by You, to use, reproduce, execute, compile, display, perform, modify or have modified (for Apple and/or its subsidiaries), sublicense and distribute Your Modifications, in any form, through multiple tiers of distribution.

4. Larger Works. You may create a Larger Work by combining Covered Code with other code not governed by the terms of this License and distribute the Larger Work as a single product. In each such instance, You must make sure the requirements of this License are fulfilled for the Covered Code or any portion thereof.

5. Limitations on Patent License. Except as expressly stated in Section 2, no other patent rights, express or implied, are granted by Apple herein. Modifications and/or Larger Works may require additional patent licenses from Apple which Apple may grant in its sole discretion.

6. Additional Terms. You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations and/or other rights consistent with the scope of the license granted herein ("Additional Terms") to one or more recipients of Covered Code. However, You may do so only on Your own behalf and as Your sole responsibility, and not on behalf of Apple. You must obtain the recipient's agreement that any such Additional Terms are offered by You alone, and You hereby agree to indemnify, defend and hold Apple harmless for any liability incurred by or claims asserted against Apple by reason of any such Additional Terms.

7. Versions of the License. Apple may publish revised and/or new versions of this License from time to time. Each version will be given a distinguishing version number. Once Original Code has been published under a particular version of this License, You may continue to use it under the terms of that version. You may also choose to use such Original Code under the terms of any subsequent version of this License published by Apple. No one other than Apple has the right to modify the terms applicable to Covered Code created under this License.

8. NO WARRANTY OR SUPPORT. The Original Code may contain in whole or in part pre-release, untested, or not fully tested works. The Original Code may contain errors that could cause failures or loss of data, and may be incomplete or contain inaccuracies. You expressly acknowledge and agree that use of the Original Code, or any portion thereof, is at Your sole and entire risk. THE ORIGINAL CODE IS PROVIDED "AS IS" AND WITHOUT WARRANTY, UPGRADES OR SUPPORT OF ANY KIND AND APPLE AND APPLE'S LICENSOR(S) (FOR THE PURPOSES OF SECTIONS 8 AND 9, APPLE AND APPLE'S LICENSOR(S) ARE COLLECTIVELY REFERRED TO AS "APPLE") EXPRESSLY DISCLAIM ALL WARRANTIES AND/OR CONDITIONS, EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES AND/OR CONDITIONS OF MERCHANTABILITY OR SATISFACTORY QUALITY AND FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT OF THIRD PARTY RIGHTS. APPLE DOES NOT WARRANT THAT THE FUNCTIONS CONTAINED IN THE ORIGINAL CODE WILL MEET YOUR REQUIREMENTS, OR THAT THE OPERATION OF THE ORIGINAL CODE WILL BE UNINTERRUPTED OR ERROR- FREE, OR THAT DEFECTS IN THE ORIGINAL CODE WILL BE CORRECTED. NO ORAL OR WRITTEN INFORMATION OR ADVICE GIVEN BY APPLE OR AN APPLE AUTHORIZED REPRESENTATIVE SHALL CREATE A WARRANTY OR IN ANY WAY INCREASE THE SCOPE OF THIS WARRANTY. You acknowledge that the Original Code is not intended for use in the operation of nuclear facilities, aircraft navigation, communication systems, or air traffic control machines in which case the failure of the Original Code could lead to death, personal injury, or severe physical or environmental damage.

9. Liability.

9.1 Infringement. If any portion of, or functionality implemented by, the Original Code becomes the subject of a claim of infringement, Apple may, at its option: (a) attempt to procure the rights necessary for Apple and You to continue using the Affected Original Code; (b) modify the Affected Original Code so that it is no longer infringing; or (c) suspend Your rights to use, reproduce, modify, sublicense and distribute the Affected Original Code until a final determination of the claim is made by a court or governmental administrative agency of competent jurisdiction and Apple lifts the suspension as set forth below. Such suspension of rights will be effective immediately upon Apple's posting of a notice to such effect on the Apple web site that is used for implementation of this License. Upon such final determination being made, if Apple is legally able, without the payment of a fee or royalty, to resume use, reproduction, modification, sublicensing and distribution of the Affected Original Code, Apple will lift the suspension of rights to the Affected Original Code by posting a notice to such effect on the Apple web site that is used for implementation of this License. If Apple suspends Your rights to Affected Original Code, nothing in this License shall be construed to restrict You, at Your option and subject to applicable law, from replacing the Affected Original Code with non-infringing code or independently negotiating for necessary rights from such third party.

9.2 LIMITATION OF LIABILITY. UNDER NO CIRCUMSTANCES SHALL APPLE BE LIABLE FOR ANY INCIDENTAL, SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES ARISING OUT OF OR RELATING TO THIS LICENSE OR YOUR USE OR INABILITY TO USE THE ORIGINAL CODE, OR ANY PORTION THEREOF, WHETHER UNDER A THEORY OF CONTRACT, WARRANTY, TORT (INCLUDING NEGLIGENCE), PRODUCTS LIABILITY OR OTHERWISE, EVEN IF APPLE HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES AND NOTWITHSTANDING THE FAILURE OF ESSENTIAL PURPOSE OF ANY REMEDY. In no event shall Apple's total liability to You for all damages under this License exceed the amount of fifty dollars (\$50.00).

10. Trademarks. This License does not grant any rights to use the trademarks or trade names "Apple", "Apple Computer", "Mac OS X", "Mac OS X Server" or any other trademarks or trade names belonging to Apple (collectively "Apple Marks") and no Apple Marks may be used to endorse or promote products derived from the Original Code other than as permitted by and in strict compliance at all times with Apple's third party trademark usage guidelines which are posted at

<http://www.apple.com/legal/guidelinesfor3rdparties.html>.

11. Ownership. Apple retains all rights, title and interest in and to the Original Code and any Modifications made by or on behalf of Apple ("Apple Modifications"), and such Apple Modifications will not be automatically subject to this License. Apple may, at its sole discretion, choose to license such Apple Modifications under this License, or on different terms from those contained in this License or may choose not to license them at all. Apple's development, use, reproduction, modification, sublicensing and distribution of Covered Code will not be subject to this License.

12. Termination.

12.1 Termination. This License and the rights granted hereunder will terminate:

(a) automatically without notice from Apple if You fail to comply with any term(s) of this License and fail to cure such breach within 30 days of becoming aware of such breach; (b) immediately in the event of the circumstances described in Section 13.5(b); or (c) automatically without notice from Apple if You, at any time during the term of this License, commence an action for patent infringement against Apple.

12.2 Effect of Termination. Upon termination, You agree to immediately stop any further use, reproduction, modification, sublicensing and distribution of the Covered Code and to destroy all copies of the Covered Code that are in your possession or control. All sublicenses to the Covered Code which have been properly granted prior to termination shall survive any termination of this License. Provisions which, by their nature, should remain in effect beyond the termination of this License shall survive, including but not limited to Sections 3, 5, 8, 9, 10, 11, 12.2 and 13. Neither party will be liable to the other for compensation, indemnity or damages of any sort solely as a result of terminating this License in accordance with its terms, and termination of this License will be without prejudice to any other right or remedy of either party.

13. Miscellaneous.

13.1 Government End Users. The Covered Code is a "commercial item" as defined in FAR 2.101. Government software and technical data rights in the Covered Code include only those rights customarily provided to the public as defined in this License. This customary commercial license in technical data and software is provided in accordance with FAR 12.211 (Technical Data) and 12.212 (Computer Software) and, for

Department of

Defense purchases, DFAR 252.227-7015 (Technical Data -- Commercial Items) and 227.7202-3 (Rights in Commercial Computer Software or Computer Software Documentation). Accordingly, all U.S. Government End Users acquire Covered Code with only those rights set forth herein.

13.2 Relationship of Parties. This License will not be construed as creating an agency, partnership, joint venture or any other form of legal association between You and Apple, and You will not represent to the contrary, whether expressly, by implication, appearance or otherwise.

13.3 Independent Development. Nothing in this License will impair Apple's right to acquire, license, develop, have others develop for it, market and/or distribute technology or products that perform the same or similar functions as, or otherwise compete with, Modifications, Larger Works, technology or products that You may develop, produce, market or distribute.

13.4 Waiver; Construction. Failure by Apple to enforce any provision of this

License will not be deemed a waiver of future enforcement of that or any other provision. Any law or regulation which provides that the language of a contract shall be construed against the drafter will not apply to this License.

13.5 Severability. (a) If for any reason a court of competent jurisdiction finds any provision of this License, or portion thereof, to be unenforceable, that provision of the License will be enforced to the maximum extent permissible so as to effect the economic benefits and intent of the parties, and the remainder of this License will continue in full force and effect. (b) Notwithstanding the foregoing, if applicable law prohibits or restricts You from fully and/or specifically complying with Sections 2 and/or 3 or prevents the enforceability of either of those Sections, this License will immediately terminate and You must immediately discontinue any use of the Covered Code and destroy all copies of it that are in your possession or control.

13.6 Dispute

Resolution. Any litigation or other dispute resolution between You and Apple relating to this License shall take place in the Northern District of California, and You and Apple hereby consent to the personal jurisdiction of, and venue in, the state and federal courts within that District with respect to this License. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded.

13.7 Entire Agreement; Governing Law. This License constitutes the entire agreement between the parties with respect to the subject matter hereof. This License shall be governed by the laws of the United States and the State of California, except that body of California law concerning conflicts of law.

Where You are located in the province of Quebec, Canada, the following clause applies: The parties hereby confirm that they have requested that this License and all related documents be drafted in English. Les parties ont exigé que le présent contrat et tous les documents connexes soient rédigés en anglais.

EXHIBIT A.

"Portions Copyright (c) 1999 Apple Computer, Inc. All Rights Reserved. This file contains Original Code and/or Modifications of Original Code as defined in and that are subject to the Apple Public Source License Version 1.1 (the "License"). You may not use this file except in compliance with the License. Please obtain a copy of the License at <http://www.apple.com/publicsource> and read it before using this file.

The Original Code and all software distributed under the License are distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, AND APPLE HEREBY DISCLAIMS ALL SUCH WARRANTIES, INCLUDING WITHOUT LIMITATION, ANY WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR NON- INFRINGEMENT. Please see the License for the specific language governing rights and limitations under the License."

1.29 open-ldap 2.4.40-8.el7

1.29.1 Available under license :

```
# $OpenLDAP$  
# Copyright 2000-2014 The OpenLDAP Foundation, All Rights Reserved.  
# COPYING RESTRICTIONS APPLY, see COPYRIGHT.
```

```
H1: OpenLDAP Public License
```

```
#!block inline  
#<FONT FACE="Courier">  
#!endblock
```

```
!include "../..../LICENSE" ; verbatim
```

#!block inline

#

#!endblock

A number of files contained in OpenLDAP Software contain a statement:

USE, MODIFICATION, AND REDISTRIBUTION OF THIS WORK IS SUBJECT TO VERSION 2.0.1 OF THE OPENLDAP PUBLIC LICENSE, A COPY OF WHICH IS AVAILABLE AT [HTTP://WWW.OPENLDAP.ORG/LICENSE.HTML](http://www.openldap.org/license.html) OR IN THE FILE "LICENSE" IN THE TOP-LEVEL DIRECTORY OF THE DISTRIBUTION.

The following is a verbatim copy of version 2.0.1 of the OpenLDAP Public License referenced in the above statement.

The OpenLDAP Public License

Version 2.0.1, 21 December 1999

Copyright 1999, The OpenLDAP Foundation, Redwood City, California, USA.

All Rights Reserved.

Redistribution and use of this software and associated documentation ("Software"), with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain copyright statements and notices. Redistributions must also contain a copy of this document.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name "OpenLDAP" must not be used to endorse or promote products derived from this Software without prior written permission of the OpenLDAP Foundation. For written permission, please contact foundation@openldap.org.
4. Products derived from this Software may not be called "OpenLDAP" nor may "OpenLDAP" appear in their names without prior written permission of the OpenLDAP Foundation. OpenLDAP is a trademark of the OpenLDAP Foundation.
5. Due credit should be given to the OpenLDAP Project (<http://www.openldap.org/>).

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND CONTRIBUTORS
``AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT
NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND
FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL
THE OPENLDAP FOUNDATION OR ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT,
INDIRECT,
INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES
(INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR
SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT,
STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED
OF THE POSSIBILITY OF SUCH DAMAGE.

OpenLDAP Public License

The OpenLDAP Public License

Version 2.8.1, 25 November 2003

Redistribution and use of this software and associated documentation
("Software"), with or without modification, are permitted provided
that the following conditions are met:

1. Redistributions in source form must retain copyright statements
and notices,
2. Redistributions in binary form must reproduce applicable copyright
statements and notices, this list of conditions, and the following
disclaimer in the documentation and/or other materials provided
with the distribution, and
3. Redistributions must contain a verbatim copy of this document.

The OpenLDAP Foundation may revise this license from time to time.
Each revision is distinguished by a version number. You may use
this Software under terms of this license revision or under the
terms of any subsequent revision of the license.

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND ITS
CONTRIBUTORS ``AS IS" AND ANY EXPRESSED
OR IMPLIED WARRANTIES,
INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY
AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT
SHALL THE OPENLDAP FOUNDATION, ITS CONTRIBUTORS, OR THE AUTHOR(S)
OR OWNER(S) OF THE SOFTWARE BE LIABLE FOR ANY DIRECT, INDIRECT,
INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING,
BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES;
LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER
CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT

LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The names of the authors and copyright holders must not be used in advertising or otherwise to promote the sale, use or other dealing in this Software without specific, written prior permission. Title to copyright in this Software shall at all times remain with copyright holders.

OpenLDAP

is a registered trademark of the OpenLDAP Foundation.

Copyright 1999-2003 The OpenLDAP Foundation, Redwood City, California, USA. All rights reserved. Permission to copy and distribute verbatim copies of this document is granted.

/*****

*

* Copyright (C) 2000 Pierangelo Masarati, <ando@sys-net.it>

* All rights reserved.

*

* Permission is granted to anyone to use this software for any purpose

* on any computer system, and to alter it and redistribute it, subject

* to the following restrictions:

*

* 1. The author is not responsible for the consequences of use of this

* software, no matter how awful, even if they arise from flaws in it.

*

* 2. The origin of this software must not be misrepresented, either by

* explicit claim or by omission. Since few users ever read sources,

* credits should appear in the documentation.

*

* 3. Altered versions must be plainly marked as such, and must not be

* misrepresented as being the original software. Since few users

* ever read sources, credits should appear in the documentation.

*

* 4. This notice may not be removed or altered.

*

*****/

Copyright 1998-2014 The OpenLDAP Foundation. All rights reserved.

COPYING RESTRICTIONS APPLY.

See COPYRIGHT and LICENSE files in the top-level directory of this distribution (i.e., ../COPYRIGHT and ../LICENSE, respectively).

NeoSoft Tcl client extensions to Lightweight Directory Access Protocol.

Copyright (c) 1998-1999 NeoSoft, Inc.
All Rights Reserved.

This software may be used, modified, copied, distributed, and sold, in both source and binary form provided that these copyrights are retained and their terms are followed.

Under no circumstances are the authors or NeoSoft Inc. responsible for the proper functioning of this software, nor do the authors assume any liability for damages incurred with its use.

Redistribution and use in source and binary forms are permitted provided that this notice is preserved and that due credit is given to NeoSoft, Inc.

NeoSoft, Inc. may not be used to endorse or promote products derived from this software without specific prior written permission. This software is provided ``as is" without express or implied warranty.

Requests for permission may be sent to NeoSoft Inc, 1770 St. James Place, Suite 500, Houston, TX, 77056.
Copyright 1998-2014 The OpenLDAP Foundation. All rights reserved.

COPYING RESTRICTIONS APPLY.

See COPYRIGHT and LICENSE files in the top-level directory of this distribution (i.e., ../COPYRIGHT and ../LICENSE, respectively).
\$OpenLDAP\$
Copyright 1999-2014 The OpenLDAP Foundation, All Rights Reserved.
COPYING RESTRICTIONS APPLY, see COPYRIGHT.

```
#  
# Plain Copyright for Software Distribution  
#  
!define HTML_TITLE "OpenLDAP Public License"  
!include "../plain.sdf"  
!include "license.sdf"; plain  
Copyright 2011-2014 Howard Chu, Symas Corp.  
All rights reserved.
```

Redistribution and use in source and binary forms, with or without modification, are permitted only as authorized by the OpenLDAP Public License.

A copy of this license is available in the file LICENSE in the top-level directory of the distribution or, alternatively, at

<<http://www.OpenLDAP.org/license.html>>.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Individual files and/or contributed packages may be copyright by other parties and/or subject to additional restrictions.

This work also contains materials derived from public sources.

Additional information about OpenLDAP can be obtained at

<<http://www.openldap.org/>>.

The OpenLDAP Public License

Version 2.8, 17 August 2003

Redistribution and use of this software and associated documentation ("Software"), with or without modification, are permitted provided that the following conditions are met:

1. Redistributions in source form must retain copyright statements and notices,
2. Redistributions in binary form must reproduce applicable copyright statements and notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution, and
3. Redistributions must contain a verbatim copy of this document.

The OpenLDAP Foundation may revise this license from time to time. Each revision is distinguished by a version number. You may use this Software under terms of this license revision or under the terms of any subsequent revision of the license.

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND ITS CONTRIBUTORS ``AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OPENLDAP FOUNDATION, ITS CONTRIBUTORS, OR THE AUTHOR(S) OR OWNER(S) OF THE SOFTWARE BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The names of the authors and copyright holders must not be used in advertising or otherwise to promote the sale, use or other dealing in this Software without specific, written prior permission. Title to copyright in this Software shall at all times remain with copyright holders.

OpenLDAP is a registered trademark
of the OpenLDAP Foundation.

Copyright 1999-2003 The OpenLDAP Foundation, Redwood City,
California, USA. All Rights Reserved. Permission to copy and
distribute verbatim copies of this document is granted.

\$OpenLDAP\$

Copyright 1999-2014 The OpenLDAP Foundation, All Rights Reserved.

COPYING RESTRICTIONS APPLY, see COPYRIGHT.

This file should match ../../COPYRIGHT (except in formatting)

```
!if OPT_PP_HTML
!define copyright '[[c]] Copyright'
!else
!define copyright 'Copyright'
!endif
```

H1: OpenLDAP Software Copyright Notices

H2: OpenLDAP Copyright Notice

```
!block nofill
[[copyright]] 1998-2012 The OpenLDAP Foundation.
{{All rights reserved.}}
!endblock
```

Redistribution and use in source and binary forms, with or without
modification, are permitted {{only as authorized}} by the {{SECT:OpenLDAP
Public License}}.

A copy of this license is available in file {{F:LICENSE}} in the
top-level directory of the distribution or, alternatively, at
<{{URL:http://www.OpenLDAP.org/license.html}}>.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Individual files and/or contributed packages may be copyright by
other parties and their use subject to additional restrictions.

This work

is derived from the University of Michigan LDAP v3.3 distribution. Information concerning this software is available at <{{URL:http://www.umich.edu/~dirsvcs/ldap/ldap.html}}>.

This work also contains materials derived from public sources.

Additional information about OpenLDAP software can be obtained at <{{URL:http://www.OpenLDAP.org/}}>.

H2: Additional Copyright Notices

!block nofill

Portions [[copyright]] 1998-2012 Kurt D. Zeilenga.

Portions [[copyright]] 1998-2006 Net Boolean Incorporated.

Portions [[copyright]] 2001-2006 IBM Corporation.

{{All rights reserved.}}

!endblock

Redistribution and use in source and binary forms, with or without modification, are permitted only as authorized by the {{SECT:OpenLDAP Public License}}.

!block nofill

Portions [[copyright]] 1999-2008 Howard Y.H. Chu.

Portions [[copyright]] 1999-2008 Symas Corporation.

Portions [[copyright]] 1998-2003 Hallvard B. Furuseth.

Portions [[copyright]] 2007-2011 Gavin Henry.

Portions [[copyright]] 2007-2011 Suretec

Systems Limited.

{{All rights reserved.}}

!endblock

Redistribution and use in source and binary forms, with or without modification, are permitted provided that this notice is preserved. The names of the copyright holders may not be used to endorse or promote products derived from this software without their specific prior written permission. This software is provided ``as is" without express or implied warranty.

H2: University of Michigan Copyright Notice

!block nofill

Portions [[copyright]] 1992-1996 Regents of the University of Michigan.

{{All rights reserved.}}

!endblock

Redistribution and use in source and binary forms are permitted provided that this notice is preserved and that due credit is given to the University of Michigan at Ann Arbor. The name of the University may not be used to endorse or promote products derived from this software without specific prior written permission. This software is provided ``as is" without express or implied warranty.

\$OpenLDAP\$

Copyright 1999-2014 The OpenLDAP Foundation, All Rights Reserved.

COPYING RESTRICTIONS APPLY, see COPYRIGHT.

#

Plain Copyright for Software Distribution

#

!define HTML_TITLE "OpenLDAP Copyright Notices"

!include "../plain.sdf"

!include "copyright.sdf"; plain

Copyright 1998-2014 The OpenLDAP Foundation

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted only as authorized by the OpenLDAP Public License.

A copy of this license is available in the file LICENSE in the top-level directory of the distribution or, alternatively, at <http://www.OpenLDAP.org/license.html>.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Individual files and/or contributed packages may be copyright by other parties and/or subject to additional restrictions.

This work is derived from the University of Michigan LDAP v3.3 distribution. Information concerning this software is available at <http://www.umich.edu/~dirsvcs/ldap/ldap.html>.

This work also contains materials derived from public sources.

Additional information about OpenLDAP can be obtained at <http://www.openldap.org/>.

Portions Copyright 1998-2012 Kurt D. Zeilenga.

Portions Copyright 1998-2006 Net Boolean Incorporated.

Portions

Copyright 2001-2006 IBM Corporation.
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted only as authorized by the OpenLDAP
Public License.

Portions Copyright 1999-2008 Howard Y.H. Chu.
Portions Copyright 1999-2008 Symas Corporation.
Portions Copyright 1998-2003 Hallvard B. Furuseth.
Portions Copyright 2007-2011 Gavin Henry.
Portions Copyright 2007-2011 Suretec Systems Ltd.
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that this notice is preserved.
The names of the copyright holders may not be used to endorse or
promote products derived from this software without their specific
prior written permission. This software is provided ``as is"
without express or implied warranty.

Portions Copyright (c) 1992-1996 Regents of the University of Michigan.
All rights reserved.

Redistribution and use in source and binary forms are
permitted
provided that this notice is preserved and that due credit is given
to the University of Michigan at Ann Arbor. The name of the
University may not be used to endorse or promote products derived
from this software without specific prior written permission. This
software is provided ``as is" without express or implied warranty.

1.30 bind 9.8.2

1.30.1 Available under license :

Redistribution terms Automated Testing Framework

=====

License

Copyright (c) 2007, 2008, 2009, 2010, 2011, 2012 The NetBSD Foundation, Inc.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE NETBSD FOUNDATION, INC. AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED.

IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright 2011, 2012 Google Inc.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * Neither the name of Google Inc. nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE

LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Relicensed

code

The following code snippets have been taken from other projects. Even though they were not originally licensed under the terms above, the original authors have agreed to relicense their work so that this project can be distributed under a single license. This section is put here just to clarify this fact.

* `configure.ac`, `Makefile.am`: The original versions were derived from the ones in the XML Catalog Manager project, version 2.2.

Author: Julio Merino <jmmv@users.sourceforge.net>

* `atf-c/ui.c`: The `format_paragraph` and `format_text` functions were derived from the ones in the Monotone project, revision 3a0982da308228d796df35f98d787c5cff2bb5b6.

Author: Julio Merino <jmmv@NetBSD.org>

* `atf-c++/detail/io.hpp`, `atf-c++/detail/io.cpp`, `atf-c++/detail/io_test.cpp`: These files were derived from the `file_handle`, `systembuf`, `pipe` and `pistream` classes and tests found in the Boost.Process library.

Author: Julio Merino <jmmv84@gmail.com>

* `admin/check-style.sh`,
`admin/check-style-common.awk`,
`admin/check-style-cpp.awk`, `admin/check-style-shell.awk`: These files, except the first one, were first implemented in the Buildtool project. They were later adapted to be part of Boost.Process and, during that process, the shell script was created.

Author: Julio Merino <jmmv84@gmail.com>

=====
vim: filetype=text:textwidth=75:expandtab:shiftwidth=2:softtabstop=2

1. Definitions

1.1. "Contributor"

means each individual or legal entity that creates, contributes to the creation of, or owns Covered Software.

1.2. "Contributor Version"

means the combination of the Contributions of others (if any) used by a Contributor and that particular Contributor's Contribution.

1.3. "Contribution"

means Covered Software of a particular Contributor.

1.4. "Covered Software"

means Source Code Form to which the initial Contributor has attached the notice in Exhibit A, the Executable Form of such Source Code Form, and Modifications of such Source Code Form, in each case including portions thereof.

1.5. "Incompatible With Secondary Licenses"

means

a. that the initial Contributor has attached the notice described in Exhibit B to the Covered Software; or

b. that the Covered Software was made available under the terms of version 1.1 or earlier of the License, but not also under the terms of a Secondary License.

1.6. "Executable Form"

means any form of the work other than Source Code Form.

1.7. "Larger Work"

means a work that combines Covered Software with other material, in a separate file or files, that is not Covered Software.

1.8. "License"

means this document.

1.9. "Licensable"

means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently, any and all of the rights conveyed by this License.

1.10. "Modifications"

means any of the following:

- a. any file in Source Code Form that results from an addition to, deletion from, or modification of the contents of Covered Software; or
- b. any new file in Source Code Form that contains any Covered Software.

1.11. "Patent Claims" of a Contributor

means any patent claim(s), including without limitation, method, process, and apparatus claims, in any patent Licensable by such Contributor that would be infringed, but for the grant of the License, by the making, using, selling, offering for sale, having made, import, or transfer of either its Contributions or its Contributor Version.

1.12. "Secondary License"

means either the GNU General Public License, Version 2.0, the GNU Lesser General Public License, Version 2.1, the GNU Affero General Public License, Version 3.0, or any later versions of those licenses.

1.13. "Source Code Form"

means the form of the work preferred for making modifications.

1.14. "You" (or "Your")

means an individual or a legal entity exercising rights under this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. License Grants and Conditions

2.1. Grants

Each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license:

- a. under intellectual property rights (other than patent or trademark) Licensable by such Contributor to use, reproduce, make available, modify, display, perform, distribute, and otherwise exploit its Contributions, either on an unmodified basis, with Modifications, or as part of a Larger Work; and
- b. under Patent Claims of such Contributor to make, use, sell, offer for sale, have made, import, and otherwise transfer either its Contributions or its Contributor Version.

2.2. Effective Date

The licenses granted in Section 2.1 with respect to any Contribution become effective for each Contribution on the date the Contributor first distributes such Contribution.

2.3. Limitations on Grant Scope

The licenses granted in this Section 2 are the only rights granted under this License. No additional rights or licenses will be implied from the distribution or licensing of Covered Software under this License. Notwithstanding Section 2.1(b) above, no patent license is granted by a Contributor:

- a. for any code that a Contributor has removed from Covered Software; or
- b. for infringements caused by: (i) Your and any other third party's modifications of Covered Software, or (ii) the combination of its Contributions with other software (except as part of its Contributor Version); or
- c. under Patent Claims infringed by Covered Software in the absence of its Contributions.

This License does not grant any rights in the trademarks, service marks, or logos of any Contributor (except as may be necessary to comply with the notice requirements in Section 3.4).

2.4. Subsequent Licenses

No Contributor makes additional grants as a result of Your choice to distribute the Covered Software under a subsequent version of this License (see Section 10.2) or under the terms of a Secondary License (if permitted under the terms of Section 3.3).

2.5. Representation

Each Contributor represents that the Contributor believes its Contributions are its original creation(s) or it has sufficient rights to grant the rights to its Contributions conveyed by this License.

2.6. Fair Use

This License is not intended to limit any rights You have under applicable copyright doctrines of fair use, fair dealing, or other equivalents.

2.7. Conditions

Sections 3.1, 3.2, 3.3, and 3.4 are conditions of the licenses granted in Section 2.1.

3. Responsibilities

3.1. Distribution of Source Form

All distribution of Covered Software in Source Code Form, including any Modifications that You create or to which You contribute, must be under the terms of this License. You must inform recipients that the Source Code Form of the Covered Software is governed by the terms of this License, and how they can obtain a copy of this License. You may not attempt to alter or restrict the recipients' rights in the Source Code Form.

3.2. Distribution of Executable Form

If You distribute Covered Software in Executable Form then:

a. such Covered Software must also be made available in Source Code Form, as described in Section 3.1, and You must inform recipients of the Executable Form how they can obtain a copy of such Source Code Form by reasonable means in a timely manner, at a charge no more than the cost of distribution to the recipient; and

b. You may distribute such Executable Form under the terms of this License, or sublicense it under different terms, provided that the

license
for the Executable Form does not attempt to limit or alter the recipients' rights in the Source Code Form under this License.

3.3. Distribution of a Larger Work

You may create and distribute a Larger Work under terms of Your choice, provided that You also comply with the requirements of this License for the Covered Software. If the Larger Work is a combination of Covered Software with a work governed by one or more Secondary Licenses, and the Covered Software is not Incompatible With Secondary Licenses, this License permits You to additionally distribute such Covered Software under the terms of such Secondary License(s), so that the recipient of the Larger Work may, at their option, further distribute the Covered Software under the terms of either this License or such Secondary License(s).

3.4. Notices

You may not remove or alter the substance of any license notices (including copyright notices, patent notices, disclaimers of warranty, or limitations of liability) contained within the Source Code Form of the Covered Software, except that You may alter any license notices to the extent required to remedy known factual inaccuracies.

3.5. Application of Additional Terms

You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Software. However, You may do so only on Your own behalf, and not on behalf of any Contributor. You must make it absolutely clear that any such warranty, support, indemnity, or liability obligation is offered by You alone, and You hereby agree to indemnify every Contributor for any liability incurred by such Contributor as a result of warranty, support, indemnity or liability terms You offer. You may include additional disclaimers of warranty and limitations of liability specific to any jurisdiction.

4. Inability to Comply Due to Statute or Regulation

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Software due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be placed in a text file included with all distributions of the Covered Software under

this License. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Termination

5.1. The rights granted under this License will terminate automatically if You fail to comply with any of its terms. However, if You become compliant, then the rights granted under this License from a particular Contributor are reinstated (a) provisionally, unless and until such Contributor explicitly

and finally terminates Your grants, and (b) on an ongoing basis, if such Contributor fails to notify You of the non-compliance by some reasonable means prior to 60 days after You have come back into compliance. Moreover, Your grants from a particular Contributor are reinstated on an ongoing basis if such Contributor notifies You of the non-compliance by some reasonable means, this is the first time You have received notice of non-compliance with this License from such Contributor, and You become compliant prior to 30 days after Your receipt of the notice.

5.2. If You initiate litigation against any entity by asserting a patent infringement claim (excluding declaratory judgment actions, counter-claims, and cross-claims) alleging that a Contributor Version directly or indirectly infringes any patent, then the rights granted to You by any and all Contributors for the Covered Software under Section 2.1 of this License shall terminate.

5.3. In the event of termination under Sections 5.1 or 5.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or Your distributors under this License prior to termination shall survive termination.

6. Disclaimer of Warranty

Covered Software is provided under this License on an "as is" basis, without warranty of any kind, either expressed, implied, or statutory, including, without limitation, warranties that the Covered Software is free of defects, merchantable, fit for a particular purpose or non-infringing.

The entire risk as to the quality and performance of the Covered Software is with You. Should any Covered Software prove defective in any respect, You (not any Contributor) assume the cost of any necessary servicing, repair, or correction. This disclaimer of warranty constitutes an essential part of this License. No use of any Covered Software is authorized under

this License except under this disclaimer.

7. Limitation of Liability

Under no circumstances and under no legal theory, whether tort (including negligence), contract, or otherwise, shall any Contributor, or anyone who distributes Covered Software as permitted above, be liable to You for any direct, indirect, special, incidental, or consequential damages of any character including, without limitation, damages for lost profits, loss of goodwill, work stoppage, computer failure or malfunction, or any and all other commercial damages or losses, even if such party shall have been informed of the possibility of such damages. This limitation of liability shall not apply to liability for death or personal injury resulting from such party's negligence to the extent applicable law prohibits such limitation. Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, so this exclusion and limitation may not apply to You.

8. Litigation

Any litigation relating to this License may be brought only in the courts of a jurisdiction where the defendant maintains its principal place of business and such litigation shall be governed by laws of that jurisdiction, without reference to its conflict-of-law provisions. Nothing in this Section shall prevent a party's ability to bring cross-claims or counter-claims.

9. Miscellaneous

This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not be used to construe this License against a Contributor.

10. Versions of the License

10.1. New Versions

Mozilla Foundation is the license steward. Except as provided in Section

10.3, no one other than the license steward has the right to modify or publish new versions of this License. Each version will be given a distinguishing version number.

10.2. Effect of New Versions

You may distribute the Covered Software under the terms of the version of the License under which You originally received the Covered Software, or under the terms of any subsequent version published by the license steward.

10.3. Modified Versions

If you create software not governed by this License, and you want to create a new license for such software, you may create and use a modified version of this License if you rename the license and remove any references to the name of the license steward (except to note that such modified license differs from this License).

10.4. Distributing Source Code Form that is Incompatible With Secondary Licenses If You choose to distribute Source Code Form that is Incompatible

With Secondary Licenses under the terms of this version of the License, the notice described in Exhibit B of this License must be attached.

Exhibit A - Source Code Form License Notice

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

If it is not possible or desirable to put the notice in a particular file, then You may include the notice in a location (such as a LICENSE file in a relevant directory) where a recipient would be likely to look for such a notice.

You may add additional accurate notices of copyright ownership.

Exhibit B - "Incompatible With Secondary Licenses" Notice

This Source Code Form is "Incompatible With Secondary Licenses", as defined by the Mozilla Public License, v. 2.0.

<!--

- Copyright (C) 2005, 2007, 2009, 2015, 2016 Internet Systems Consortium, Inc. ("ISC")

-

- This Source Code Form is subject to the terms of the Mozilla Public

- License, v. 2.0. If a copy of the MPL was not distributed with this

- file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

-->

```
<!-- $Id$ -->
```

```
<!-- Generate ISC copyright comments from Docbook copyright metadata. -->
```

```
<xsl:stylesheet version="1.0"
xmlns:xsl="http://www.w3.org/1999/XSL/Transform"
xmlns:xi="http://www.w3.org/2001/XInclude"
xmlns:db="http://docbook.org/ns/docbook">

<xsl:template name="isc.copyright.format">
  <xsl:param name="text"/>
  <xsl:value-of select="$isc.copyright.leader"/>
  <xsl:value-of select="normalize-space(substring-before($text, '&#10;'))"/>
  <xsl:text>&#10;</xsl:text>
  <xsl:variable name="rest" select="substring-after($text, '&#10;')"/>
  <xsl:if test="translate($rest, '&#9;&#32;', '')">
    <xsl:call-template name="isc.copyright.format">
      <xsl:with-param
name="text" select="$rest"/>
    </xsl:call-template>
  </xsl:if>
</xsl:template>

<xsl:variable name="isc.copyright.text">
  <xsl:text>
    This Source Code Form is subject to the terms of the Mozilla Public
    License, v. 2.0. If a copy of the MPL was not distributed with this
    file, You can obtain one at http://mozilla.org/MPL/2.0/.
  </xsl:text>
</xsl:variable>

<xsl:variable name="isc.copyright">
  <xsl:call-template name="isc.copyright.format">
    <xsl:with-param name="text">
      <xsl:for-each select="book/info/copyright | refentry/docinfo/copyright">
        <xsl:text>Copyright (C) </xsl:text>
        <xsl:call-template name="copyright.years">
          <xsl:with-param name="years" select="year"/>
        </xsl:call-template>
        <xsl:text> </xsl:text>
        <xsl:value-of select="holder"/>
        <xsl:value-of select="$isc.copyright.breakline"/>
        <xsl:text>&#10;</xsl:text>
      </xsl:for-each>
    <xsl:value-of select="$isc.copyright.text"/>
  </xsl:with-param>
</xsl:variable>
```

```
</xsl:call-template>
</xsl:variable>
</xsl:stylesheet>
```

```
<!--
```

```
- Local variables:
- mode: sgml
- End:
```

```
-->
```

Copyright (C) 1996-2017 Internet Systems Consortium, Inc. ("ISC")

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

Portions of this code release fall under one or more of the following Copyright notices. Please see individual source files for details.

For binary releases also see: OpenSSL-LICENSE.

Copyright (C) 1996-2001 Nominum, Inc.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND NOMINUM DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL NOMINUM BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (C) 1995-2000 by Network Associates, Inc.

Permission to use, copy, modify, and/or distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND ISC AND NETWORK ASSOCIATES DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED

WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL ISC BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (C) 2002 Stichting NLnet, Netherlands, stichting@nlnet.nl.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND STICHTING NLNET DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL STICHTING NLNET BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

The development of Dynamically Loadable Zones (DLZ) for Bind 9 was conceived and contributed by Rob Butler.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND ROB BUTLER DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL ROB BUTLER BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (c) 1987, 1990, 1993, 1994
The Regents of the University of California. All rights reserved.

Redistribution and use in source and binary forms,
with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES

(INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) The Internet Society 2005. This version of
this module is part of RFC 4178; see the RFC itself for
full legal notices.

(The above copyright notice is per RFC 3978 5.6 (a), q.v.)

Copyright (c) 2004 Masarykova universita
(Masaryk University, Brno, Czech Republic)
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright

notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 1997 - 2003 Kungliga Tekniska Hgskolan
(Royal Institute of Technology, Stockholm, Sweden).
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the Institute nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE INSTITUTE AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE INSTITUTE OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS

OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright

(c) 1998 Doug Rabson

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright ((c)) 2002, Rice University

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following

disclaimer in the documentation and/or other materials provided with the distribution.

* Neither the name of Rice University (RICE) nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

This software is provided by RICE and the contributors on an "as is" basis, without any representations or warranties of any kind, express or implied including, but not limited to, representations or warranties of non-infringement, merchantability or fitness for a particular purpose. In no event shall RICE or contributors be liable for any direct, indirect, incidental, special, exemplary, or consequential damages (including, but not limited to, procurement of substitute goods or services; loss of use, data, or profits; or business interruption) however caused and on any theory of liability, whether in contract, strict liability, or tort (including negligence or otherwise) arising in any way out of the use of this software, even if advised of the possibility of such damage.

Copyright

(c) 1993 by Digital Equipment Corporation.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies, and that the name of Digital Equipment Corporation not be used in advertising or publicity pertaining to distribution of the document or software without specific, written prior permission.

THE SOFTWARE IS PROVIDED "AS IS" AND DIGITAL EQUIPMENT CORP. DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL DIGITAL EQUIPMENT CORPORATION BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright

2000 Aaron D. Gifford. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the copyright holder nor the names of contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR(S) AND CONTRIBUTOR(S) ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) OR CONTRIBUTOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 1998 Doug Rabson.
Copyright (c) 2001 Jake Burkholder.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright

(C) 1995, 1996, 1997, and 1998 WIDE Project.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the project nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE PROJECT AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN

NO EVENT SHALL THE PROJECT OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 1999-2000 by Nortel Networks Corporation

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND NORTEL NETWORKS DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY

AND FITNESS. IN NO EVENT SHALL NORTEL NETWORKS BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (c) 2000-2002 Japan Network Information Center. All rights reserved.

By using this file, you agree to the terms and conditions set forth below.

LICENSE TERMS AND CONDITIONS

The following License Terms and Conditions apply, unless a different license is obtained from Japan Network Information Center ("JPNIC"), a Japanese association, Kokusai-Kougyou-Kanda Bldg 6F, 2-3-4 Uchi-Kanda, Chiyoda-ku, Tokyo 101-0047, Japan.

1. Use, Modification and Redistribution (including distribution of any modified or derived work) in source and/or binary forms is permitted under this License Terms and Conditions.
2. Redistribution of source code must retain the copyright notices as they appear in each source code file, this License Terms and Conditions.
3. Redistribution in binary form must reproduce the Copyright Notice, this License Terms and Conditions, in the documentation and/or other materials provided with the distribution. For the purposes of binary distribution the "Copyright Notice" refers to the following language:
"Copyright (c) 2000-2002 Japan Network Information Center. All rights reserved."
4. The name of JPNIC may not be used to endorse or promote products derived from this Software without specific prior written approval of JPNIC.
5. Disclaimer/Limitation of Liability: THIS SOFTWARE IS PROVIDED BY JPNIC "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL JPNIC BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,

WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

Copyright (C) 2004 Nominet, Ltd.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND NOMINET DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS.

IN NO EVENT SHALL ISC BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Portions Copyright RSA Security Inc.

License to copy and use this software is granted provided that it is identified as "RSA Security Inc. PKCS #11 Cryptographic Token Interface (Cryptoki)" in all material mentioning or referencing this software.

License is also granted to make and use derivative works provided that such works are identified as "derived from the RSA Security Inc. PKCS #11 Cryptographic Token Interface (Cryptoki)" in all material mentioning or referencing the derived work.

RSA Security Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

Copyright (c) 1996, David Mazieres <dm@uun.org>
Copyright (c) 2008, Damien Miller <djm@openbsd.org>

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND THE AUTHOR DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright

(c) 2000-2001 The OpenSSL Project. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgment:
"This product includes software developed by the OpenSSL Project for use in the OpenSSL Toolkit. (<http://www.OpenSSL.org/>)"
4. The names "OpenSSL Toolkit" and "OpenSSL Project" must not be used to endorse or promote products derived from this software without prior written permission. For written permission, please contact licensing@OpenSSL.org.
5. Products derived from this software may not be called "OpenSSL" nor may "OpenSSL" appear in their names without prior written permission of the OpenSSL Project.
6. Redistributions of any form whatsoever must retain the following acknowledgment:
"This product includes software developed by the OpenSSL Project for use in the OpenSSL Toolkit (<http://www.OpenSSL.org/>)"

THIS SOFTWARE IS PROVIDED BY THE OpenSSL PROJECT ``AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OpenSSL PROJECT OR ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 1995, 1997, 1998 The NetBSD Foundation, Inc.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE NETBSD FOUNDATION, INC. AND CONTRIBUTORS ``AS IS'' AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 2008-2011 Red Hat, Inc.

Permission to use, copy, modify, and/or distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE

SOFTWARE IS PROVIDED "AS IS" AND Red Hat DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL Red Hat BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (c) 2013-2014, Farsight Security, Inc.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the copyright holder nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 2014 by Farsight Security, Inc.

Licensed under the Apache License, Version 2.0 (the "License");
you may not use this file except in compliance with the License.

You may obtain a copy of the License at

<http://www.apache.org/licenses/LICENSE-2.0>

Unless required by applicable law or agreed to in writing, software distributed under the License is distributed on an "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied. See the License for the specific language governing permissions and limitations under the License.

Copyright (C) 1999-2014 Internet Systems Consortium, Inc. ("ISC")

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

Copyright (C) 2009-2015 Red Hat

Permission to use, copy, modify, and/or distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND AUTHORS DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL ISC BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (c) 2005 - 2008, Holger Zuleger HZnet. All rights reserved.

This software is open source.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

Neither the name of Holger Zuleger HZnet nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS

"AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED.

IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 2000-2002 Japan Network Information Center. All rights reserved.

By using this file, you agree to the terms and conditions set forth below.

LICENSE TERMS AND CONDITIONS

The following License Terms and Conditions apply, unless a different license is obtained from Japan Network Information Center ("JPNIC"), a Japanese association, Kokusai-Kogyo-Kanda Bldg 6F, 2-3-4 Uchi-Kanda, Chiyoda-ku, Tokyo 101-0047, Japan.

1. Use, Modification and Redistribution (including distribution of any modified or derived work) in source and/or binary forms is permitted under this License Terms and Conditions.
2. Redistribution of source code must retain the copyright notices as they appear in each source code file, this License Terms and Conditions.
3. Redistribution in binary form must reproduce the Copyright Notice, this License Terms and Conditions, in the documentation and/or other materials provided with the distribution. For the purposes of binary distribution
the "Copyright Notice" refers to the following language:
"Copyright (c) 2000-2002 Japan Network Information Center. All rights reserved."
4. The name of JPNIC may not be used to endorse or promote products derived from this Software without specific prior written approval of JPNIC.
5. Disclaimer/Limitation of Liability: THIS SOFTWARE IS PROVIDED BY JPNIC "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL JPNIC BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,

WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

1.31 rsync 3.0.6

1.31.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component

(kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under

the conditions stated below. Sublicensing is not allowed;
section 10
makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately
publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any
non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all
recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to
"keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the

Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization

keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own

removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent

(such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any

author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least

the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.
Copyright (c) 1998 Red Hat Software

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the X Consortium shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the X Consortium.

1.32 xmlrpc-c 1.16.24

1.32.1 Available under license :

The copyright owners of this package license the public to copy it (and do other things with it which are controlled by copyright law) under a few simple conditions.

Each source file describes the copyright license for that particular file. This file summarizes the licenses for your convenience.

All the code written specifically for Xmlrpc-c, which is most of the code, and the aggregation, is licensed under the XML-RPC FOR C/C++ license shown below.

Some of the code was written for another purpose and copied into Xmlrpc-c. Its copyright owners license the code under a different license:

The Expat Licence applies to the contents of the directory lib/expat, the ABYSS Web Server License applies to the contents of the directory lib/abyss and parts of the file src/xmlrpc_abyss.c.

The Python 1.5.2 license applies to parts of the file src/xmlrpc_base64.c.

And as for the tools/ directory, you'll have to examine the licenses on your own.

These same licenses have been offered throughout Xmlrpc-c's history.

XML-RPC For C/C++ License

Copyright (C) 2001 by First Peer, Inc. All rights reserved.

Copyright (C) 2001 by Eric Kidd. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Expat License

Copyright (c) 1998, 1999, 2000 Thai Open Source Software Center Ltd

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify,

merge, publish,
distribute, sublicense, and/or sell copies of the Software, and to
permit persons to whom the Software is furnished to do so, subject to
the following conditions:

The above copyright notice and this permission notice shall be included
in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF
MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT.
IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY
CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT,
TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE
SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

ABYSS Web Server License

Copyright (C) 2000 by Moez Mahfoudh <mmoez@bigfoot.com>. All rights reserved.

Redistribution and use in source and binary forms, with
or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in the
documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products
derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS "AS IS" AND
ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE
FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE
GOODS
OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

Python 1.5.2 License

Copyright 1991, 1992, 1993, 1994 by Stichting Mathematisch Centrum,
Amsterdam, The Netherlands.

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of Stichting Mathematisch Centrum or CWI or Corporation for National Research Initiatives or CNRI not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

While CWI is the initial source for this software, a modified version is made available by the Corporation for National Research Initiatives (CNRI) at the Internet address <ftp://ftp.python.org>.

STICHTING MATHEMATISCH CENTRUM AND CNRI DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL STICHTING MATHEMATISCH CENTRUM OR CNRI BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

ABYSS Web Server License

Copyright (C) 2000 by Moez Mahfoudh <mmoez@bigfoot.com>. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 2001 by Eric Kidd. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.33 free-type 2.4.11

1.33.1 Available under license :

The FreeType Project LICENSE

2006-Jan-27

Copyright 1996-2002, 2006 by

Introduction

=====

The FreeType Project is distributed in several archive packages; some of them may contain, in addition to the FreeType font engine, various tools and contributions which rely on, or relate to, the FreeType Project.

This license applies to all files found in such packages, and which do not fall under their own explicit license. The license affects thus the FreeType font engine, the test programs, documentation and makefiles, at the very least.

This license was inspired by the BSD, Artistic, and IJG (Independent JPEG Group) licenses, which all encourage inclusion and use of free software in commercial and freeware products alike. As a consequence, its main points are that:

- o We don't promise that this software works. However, we will be interested in any kind of bug reports. (^ as is' distribution)
- o You can use this software for whatever you want, in parts or full form, without having to pay us. (^ royalty-free' usage)
- o You may not pretend that you wrote this software. If you use it, or only parts of it, in a program, you must acknowledge somewhere in your documentation that you have used the FreeType code. (^ credits')

We specifically permit and encourage the inclusion of this software, with or without modifications, in commercial products. We disclaim all warranties covering The FreeType Project and assume no liability related to The FreeType Project.

Finally, many people asked us for a preferred form for a credit/disclaimer to use in compliance with this license. We thus encourage you to use the following text:

""

Portions
of this software are copyright <year> The FreeType
Project (www.freetype.org). All rights reserved.

""

Please replace <year> with the value from the FreeType version you actually use.

Legal Terms

=====

0. Definitions

Throughout this license, the terms `package`, `FreeType Project`, and `FreeType archive` refer to the set of files originally distributed by the authors (David Turner, Robert Wilhelm, and Werner Lemberg) as the `FreeType Project`, be they named as alpha, beta or final release.

`You' refers to the licensee, or person using the project, where `using' is a generic term including compiling the project's source code as well as linking it to form a `program' or `executable'. This program is referred to as `a program using the FreeType engine'.

This license applies to all files distributed in the original FreeType Project, including all source code, binaries and documentation, unless otherwise stated in the file in its original, unmodified form as distributed in the original archive. If you are unsure whether or not a particular file is covered by this license, you must contact us to verify this.

The FreeType Project is copyright (C) 1996-2000 by David Turner, Robert Wilhelm, and Werner Lemberg. All rights reserved except as specified below.

1. No Warranty

THE FREETYPE PROJECT IS PROVIDED `AS IS' WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT WILL ANY OF THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY DAMAGES CAUSED BY THE USE OR THE INABILITY TO USE, OF THE FREETYPE PROJECT.

2. Redistribution

This license grants a worldwide, royalty-free, perpetual and irrevocable right and license to use, execute, perform, compile, display, copy, create derivative works of, distribute and sublicense the FreeType Project (in both source and object code forms) and derivative works thereof for any purpose; and to authorize others to exercise some or all of the rights granted herein, subject to the following conditions:

- o Redistribution of source code must retain this license file ('FTL.TXT') unaltered; any additions, deletions or changes to the original files must be clearly indicated in accompanying documentation. The copyright notices of the unaltered, original files must be preserved in all copies of source files.

- o Redistribution in binary form must provide a disclaimer that states that the software is based in part of the work of the FreeType Team, in the distribution documentation. We also encourage you to put an URL to the FreeType web page in your documentation, though this isn't mandatory.

These conditions apply to any software derived from or based on the FreeType Project, not just the unmodified files. If you use our work, you must acknowledge us. However, no fee need be paid to us.

3. Advertising

Neither the FreeType authors and contributors nor you shall use the name of the other for commercial, advertising, or promotional purposes without specific prior written permission.

We suggest, but do not require, that you use one or more of the following phrases to refer to this software in your documentation or advertising materials: 'FreeType Project', 'FreeType Engine', 'FreeType library', or 'FreeType Distribution'.

As you have not signed this license, you are not required to accept it. However, as the FreeType Project is copyrighted material, only this license, or another one contracted with the authors, grants you the right to use, distribute, and modify it. Therefore, by using, distributing, or modifying the FreeType Project, you indicate that you understand and accept all the terms of this license.

4. Contacts

There are two mailing lists related to FreeType:

o freetype@nongnu.org

Discusses general use and applications of FreeType, as well as future and wanted additions to the library and distribution.

If you are looking for support, start in this list if you haven't found anything to help you in the documentation.

o freetype-devel@nongnu.org

Discusses bugs, as well as engine internals, design issues, specific licenses, porting, etc.

Our home page can be found at

<https://www.freetype.org>

--- end of FTL.TXT ---

Files that don't get a copyright, or which are taken from elsewhere.

#

All lines in this file are patterns, including the comment lines; this

means that e.g. `FTL.TXT' matches all files that have this string in

the file name (including the path relative to the current directory,

always starting with `./').

#

Don't put empty lines into this file!

#

.gitignore

#

builds/unix/pkg.m4

#

docs/FTL.TXT

docs/GPLv2.TXT

#

include/freetype/internal/fthash.h

#

src/base/fthash.c

src/base/md5.c

src/base/md5.h

#

src/bdf/bdf.c

src/bdf/bdf.h

```
src/bdf/bdfdrivr.c
src/bdf/bdfdrivr.h
src/bdf/bdferror.h
src/bdf/bdflib.c
src/bdf/module.mk
src/bdf/README
src/bdf/rules.mk
#
src/pcf/module.mk
src/pcf/pcf.c
src/pcf/pcf.h
src/pcf/pcfdrivr.c
src/pcf/pcfdrivr.h
src/pcf/pcferror.h
src/pcf/pcfread.c
src/pcf/pcfread.h
src/pcf/pcfutil.c
src/pcf/pcfutil.h
src/pcf/README
src/pcf/rules.mk
#
src/gzip/adler32.c
src/gzip/infblock.c
src/gzip/infblock.h
src/gzip/infcodes.c
src/gzip/infcodes.h
src/gzip/inffixed.h
src/gzip/inflate.c
src/gzip/inftrees.c
src/gzip/inftrees.h
src/gzip/infutil.c
src/gzip/infutil.h
src/gzip/zconf.h
src/gzip/zlib.h
src/gzip/zutil.c
src/gzip/zutil.h
#
src/tools/apinames.c
src/tools/ftrandom/ftrandom.c
#
#
EOF
```

The FreeType 2 font engine is copyrighted work and cannot be used legally without a software license. In order to make this project usable to a vast majority of developers, we distribute it under two mutually exclusive open-source licenses.

This means that *you* must choose *one* of the two licenses described below, then obey all its terms and conditions when using FreeType 2 in any of your projects or products.

- The FreeType License, found in the file `FTL.TXT`, which is similar to the original BSD license *with* an advertising clause that forces you to explicitly cite the FreeType project in your product's documentation. All details are in the license file. This license is suited to products which don't use the GNU General Public License.

Note that this license is compatible to the GNU General Public License version 3, but not version 2.

- The GNU General Public License version 2, found in `GPLv2.TXT` (any later version can be used also), for programs which already use the GPL. Note that the FTL is incompatible with GPLv2 due to its advertisement clause.

The contributed BDF and PCF drivers come with a license similar to that of the X Window System. It is compatible to the above two licenses (see file `src/bdf/README` and `src/pcf/README`). The same holds for the files ``fthash.c'` and ``fthash.h'`; their code was part of the BDF driver in earlier FreeType versions.

The gzip module uses the zlib license (see `src/gzip/zlib.h`) which too is compatible to the above two licenses.

The MD5 checksum support (only used for debugging in development builds) is in the public domain.

--- end of LICENSE.TXT ---

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This

General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an

announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you

received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program

specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,

or

(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.34 libx11 1.6.3

1.34.1 Available under license :

The following is the 'standard copyright' agreed upon by most contributors, and is currently the canonical license preferred by the X.Org Foundation. This is a slight variant of the common MIT license form published by the Open Source Initiative at <http://www.opensource.org/licenses/mit-license.php>

Copyright holders of new code should use this license statement where possible, and insert their name to this list. Please sort by surname for people, and by the full name for other entities (e.g. Juliusz Chroboczek sorts before Intel Corporation sorts before Daniel Stone).

See each individual source file or directory for the license that applies to that file.

Copyright (C) 2003-2006,2008 Jamey Sharp, Josh Triplett

Copyright 2009 Red Hat, Inc.

Copyright 1990-1992,1999,2000,2004,2009,2010 Oracle and/or its affiliates.

All rights reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to

deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice (including the next paragraph) shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER

DEALINGS IN THE SOFTWARE.

The following licenses
are 'legacy' - usually MIT/X11 licenses with the name
of the copyright holder(s) in the license statement:

Copyright 1984-1994, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its
documentation for any purpose is hereby granted without fee, provided that
the above copyright notice appear in all copies and that both that
copyright notice and this permission notice appear in supporting
documentation.

The above copyright notice and this permission notice shall be included in
all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE
OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN
AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN
CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be
used in advertising or otherwise to promote the sale, use or other dealings
in this Software without prior written authorization from The Open Group.

X Window System is a trademark of The Open Group.

Copyright 1985, 1986, 1987, 1988, 1989, 1990, 1991, 1994, 1996 X Consortium
Copyright 2000 The XFree86 Project, Inc.

Permission is hereby granted, free of charge, to any person obtaining
a copy of this software and associated documentation files (the
"Software"), to deal in the Software without restriction, including
without limitation the rights to use, copy, modify, merge, publish,
distribute, sublicense, and/or sell copies of the Software, and to
permit persons to whom the Software is furnished to do so, subject to
the following conditions:

The above copyright notice and this permission notice shall be included
in all copies or substantial portions

of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the X Consortium shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the X Consortium.

Copyright 1985, 1986, 1987, 1988, 1989, 1990, 1991 by
Digital Equipment Corporation

Portions Copyright 1990, 1991 by Tektronix, Inc.

Permission to use, copy, modify and distribute this documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appears in all copies and that both that copyright notice and this permission notice appear in all copies, and that the names of Digital and Tektronix not be used in in advertising or publicity pertaining to this documentation without specific, written prior permission. Digital and Tektronix makes no representations about the suitability of this documentation for any purpose. It is provided ``as is" without express or implied warranty.

Copyright (c) 1999-2000 Free Software Foundation, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,

FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE FREE SOFTWARE FOUNDATION BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the Free Software Foundation shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the Free Software Foundation.

Code and supporting documentation (c) Copyright 1990 1991 Tektronix, Inc.
All Rights Reserved

This file is a component of an X Window System-specific implementation of Xcms based on the TekColor Color Management System. TekColor is a trademark of Tektronix, Inc. The term "TekHVC" designates a particular color space that is the subject of U.S. Patent No. 4,985,853 (equivalent foreign patents pending). Permission is hereby granted to use, copy, modify, sell, and otherwise distribute this software and its documentation for any purpose and without fee, provided that:

1. This copyright, permission, and disclaimer notice is reproduced in all copies of this software and any modification thereof and in supporting documentation;
2. Any color-handling application which displays TekHVC color coordinates identifies these as TekHVC color coordinates in any interface that displays these coordinates and in any associated documentation;
3. The term "TekHVC" is always used, and is only used, in association with the mathematical derivations of the TekHVC Color Space, including those provided in this file and any equivalent pathways and mathematical derivations, regardless of digital (e.g., floating point or integer) representation.

Tektronix makes no representation about the suitability of this software for any purpose. It is provided "as is" and with all faults.

TEKTRONIX DISCLAIMS ALL WARRANTIES APPLICABLE TO THIS SOFTWARE, INCLUDING THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL TEKTRONIX BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA, OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE, OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR THE PERFORMANCE OF THIS SOFTWARE.

(c) Copyright 1995 FUJITSU LIMITED

This is source code modified by FUJITSU LIMITED under the Joint Development Agreement for the CDE/Motif PST.

Copyright 1992 by Oki Technosystems

Laboratory, Inc.

Copyright 1992 by Fuji Xerox Co., Ltd.

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Oki Technosystems Laboratory and Fuji Xerox not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

Oki Technosystems Laboratory and Fuji Xerox make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

OKI TECHNOSYSTEMS LABORATORY AND FUJI XEROX DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL OKI TECHNOSYSTEMS LABORATORY AND FUJI XEROX BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL

DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1990, 1991, 1992, 1993, 1994 by FUJITSU LIMITED

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of FUJITSU LIMITED not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

FUJITSU LIMITED makes no representations about the suitability of this software for any purpose.

It is provided "as is" without express or implied warranty.

FUJITSU LIMITED DISCLAIM ALL WARRANTIES
WITH REGARD TO THIS SOFTWARE,
INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO
EVENT SHALL FUJITSU LIMITED BE LIABLE FOR ANY SPECIAL, INDIRECT OR
CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF
USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR
OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR
PERFORMANCE OF THIS SOFTWARE.

Copyright (c) 1995 David E. Wexelblat. All rights reserved

Permission is hereby granted, free of charge, to any person obtaining
a copy of this software and associated documentation files (the
"Software"), to deal in the Software without restriction, including
without limitation the rights to use, copy, modify, merge, publish,
distribute, sublicense, and/or sell copies of the Software, and to
permit persons to whom the Software is furnished to do so, subject to
the following conditions:

The above copyright notice and this permission
notice shall be included
in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF
MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT.
IN NO EVENT SHALL DAVID E. WEXELBLAT BE LIABLE FOR ANY CLAIM, DAMAGES OR
OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of David E. Wexelblat shall
not be used in advertising or otherwise to promote the sale, use or
other dealings in this Software without prior written authorization
from David E. Wexelblat.

Copyright 1990, 1991 by OMRON Corporation

Permission to use, copy, modify, distribute, and sell this software and its
documentation for any purpose is hereby granted without fee, provided

that
the above copyright notice appear in all copies and that both that
copyright notice and this permission notice appear in supporting
documentation, and that the name OMRON not be used in
advertising or publicity pertaining to distribution of the software without
specific, written prior permission. OMRON makes no representations
about the suitability of this software for any purpose. It is provided
"as is" without express or implied warranty.

OMRON DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE,
INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO
EVENT SHALL OMRON BE LIABLE FOR ANY SPECIAL, INDIRECT OR
CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE,
DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER
TORTUOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR
PERFORMANCE OF THIS SOFTWARE.

Copyright 1985, 1986, 1987, 1988, 1989, 1990, 1991 by
Digital Equipment
Corporation

Portions Copyright 1990, 1991 by Tektronix, Inc

Rewritten for X.org by Chris Lee <clee@freedesktop.org>

Permission to use, copy, modify, distribute, and sell this documentation
for any purpose and without fee is hereby granted, provided that the above
copyright notice and this permission notice appear in all copies.
Chris Lee makes no representations about the suitability for any purpose
of the information in this document. It is provided "\\as-is" without
express or implied warranty.

Copyright 1993 by Digital Equipment Corporation, Maynard, Massachusetts,
Copyright 1994 by FUJITSU LIMITED
Copyright 1994 by Sony Corporation

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its
documentation for any purpose and without fee is hereby granted,
provided that the above copyright notice appear in all copies and that
both that copyright notice and this permission notice
appear in
supporting documentation, and that the names of Digital, FUJITSU

LIMITED and Sony Corporation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

DIGITAL, FUJITSU LIMITED AND SONY CORPORATION DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL DIGITAL, FUJITSU LIMITED AND SONY CORPORATION BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1991 by the Open Software Foundation

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above

copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Open Software Foundation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Open Software Foundation makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

OPEN SOFTWARE FOUNDATION DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL OPEN SOFTWARE FOUNDATION BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright
1990, 1991, 1992, 1993, 1994 by FUJITSU LIMITED
Copyright 1993, 1994 by Sony Corporation

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting

documentation, and that the name of FUJITSU LIMITED and Sony Corporation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. FUJITSU LIMITED and Sony Corporation makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

FUJITSU LIMITED AND SONY CORPORATION DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL FUJITSU LIMITED OR SONY CORPORATION BE LIABLE FOR

ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (c) 1993, 1995 by Silicon Graphics Computer Systems, Inc.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Silicon Graphics not be used in advertising or publicity pertaining to distribution of the software without specific prior written permission. Silicon Graphics makes no representation about the suitability of this software for any purpose. It is provided "as is" without any express or implied warranty.

SILICON

GRAPHICS DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL SILICON GRAPHICS BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1991, 1992, 1993, 1994 by FUJITSU LIMITED
Copyright 1993 by Digital Equipment Corporation

Permission to use, copy, modify, distribute, and sell this software

and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of FUJITSU LIMITED and Digital Equipment Corporation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. FUJITSU LIMITED and Digital Equipment Corporation makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

FUJITSU LIMITED AND DIGITAL EQUIPMENT CORPORATION DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL FUJITSU LIMITED AND DIGITAL EQUIPMENT CORPORATION BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1992, 1993 by FUJITSU LIMITED
Copyright 1993 by Fujitsu Open Systems Solutions, Inc.
Copyright 1994 by Sony
Corporation

Permission to use, copy, modify, distribute and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of FUJITSU LIMITED, Fujitsu Open Systems Solutions, Inc. and Sony Corporation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. FUJITSU LIMITED, Fujitsu Open Systems Solutions, Inc. and Sony Corporation make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

FUJITSU LIMITED, FUJITSU OPEN SYSTEMS SOLUTIONS, INC. AND SONY CORPORATION DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL FUJITSU OPEN SYSTEMS SOLUTIONS, INC., FUJITSU LIMITED AND SONY CORPORATION BE LIABLE FOR ANY SPECIAL, INDIRECT OR

CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1987, 1988, 1990, 1993 by Digital Equipment Corporation,
Maynard, Massachusetts,

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Digital not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

DIGITAL DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL DIGITAL BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1993 by SunSoft, Inc.
Copyright 1999-2000 by Bruno Haible

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of SunSoft, Inc. and Bruno Haible not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. SunSoft, Inc. and Bruno Haible make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

SunSoft Inc. AND Bruno Haible DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY

AND FITNESS, IN NO EVENT SHALL SunSoft, Inc. OR Bruno Haible BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1991 by the Open Software Foundation
Copyright 1993 by the TOSHIBA Corp.

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of Open Software Foundation and TOSHIBA not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Open Software Foundation and TOSHIBA make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

OPEN SOFTWARE FOUNDATION AND TOSHIBA DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL OPEN SOFTWARE FOUNDATION OR TOSHIBA BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1988 by Wyse Technology, Inc.,
San Jose, Ca.,

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name Wyse not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

WYSE DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL

DIGITAL BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright

1991 by the Open Software Foundation

Copyright 1993, 1994 by the Sony Corporation

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of Open Software Foundation and Sony Corporation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Open Software Foundation and Sony Corporation make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

OPEN SOFTWARE FOUNDATION AND SONY CORPORATION DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL OPEN SOFTWARE FOUNDATION OR SONY CORPORATION BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1992, 1993 by FUJITSU LIMITED

Copyright 1993 by Fujitsu Open Systems Solutions, Inc.

Permission to use, copy, modify, distribute and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of FUJITSU LIMITED and Fujitsu Open Systems Solutions, Inc. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. FUJITSU LIMITED and Fujitsu Open Systems Solutions, Inc. makes no

representations about
the suitability of this software for any purpose.
It is provided "as is" without express or implied warranty.

FUJITSU LIMITED AND FUJITSU OPEN SYSTEMS SOLUTIONS, INC. DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL FUJITSU OPEN SYSTEMS SOLUTIONS, INC. AND FUJITSU LIMITED BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1993, 1994 by Sony Corporation

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Sony Corporation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Sony Corporation makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

SONY CORPORATION DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL SONY CORPORATION BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1986, 1998 The Open Group
Copyright (c) 2000 The XFree86 Project, Inc.

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM OR THE XFREE86 PROJECT BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the X Consortium or of the XFree86 Project shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the X Consortium and the XFree86 Project.

Copyright 1990, 1991 by OMRON Corporation, NTT Software Corporation,
and Nippon Telegraph and Telephone Corporation
Copyright 1991 by the Open Software Foundation
Copyright 1993 by the FUJITSU LIMITED

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of OMRON, NTT Software, NTT, and Open Software Foundation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. OMRON, NTT Software, NTT, and Open Software Foundation make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

OMRON, NTT SOFTWARE, NTT, AND OPEN SOFTWARE FOUNDATION
DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING
ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT
SHALL OMRON, NTT SOFTWARE, NTT, OR OPEN SOFTWARE FOUNDATION BE
LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES
WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN
ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF
OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1988 by Wyse Technology, Inc., San Jose, Ca,
Copyright 1987 by Digital Equipment Corporation, Maynard, Massachusetts,

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name Digital not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

DIGITAL AND WYSE DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL DIGITAL OR WYSE BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1991, 1992 by Fuji Xerox Co., Ltd.
Copyright 1992, 1993, 1994 by FUJITSU LIMITED

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Fuji Xerox, FUJITSU LIMITED not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Fuji Xerox, FUJITSU LIMITED make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

FUJI XEROX, FUJITSU LIMITED DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL FUJI XEROX, FUJITSU LIMITED BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR

PERFORMANCE OF THIS SOFTWARE.

Copyright
2006 Josh Triplett

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

(c) Copyright 1996 by Sebastien Marineau and Holger Veit
<marineau@genie.uottawa.ca>
<Holger.Veit@gmd.de>

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL HOLGER VEIT BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,

WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of Sebastien Marineau or Holger Veit shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from Holger Veit or Sebastien Marineau.

Copyright 1990, 1991 by OMRON Corporation, NTT Software Corporation,
and Nippon Telegraph and Telephone Corporation
Copyright 1991 by the Open Software Foundation
Copyright 1993 by the TOSHIBA Corp.
Copyright 1993, 1994 by Sony Corporation
Copyright 1993, 1994 by the FUJITSU LIMITED

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of OMRON, NTT Software, NTT, Open Software Foundation, and Sony Corporation not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. OMRON, NTT Software, NTT, Open Software Foundation, and Sony Corporation make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

OMRON, NTT SOFTWARE, NTT, OPEN SOFTWARE FOUNDATION, AND SONY CORPORATION DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL OMRON, NTT SOFTWARE, NTT, OPEN SOFTWARE FOUNDATION, OR SONY CORPORATION BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 2000 by Bruno Haible

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and

that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Bruno Haible not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Bruno Haible makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

Bruno Haible DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT

SHALL Bruno Haible BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 2003 Keith Packard

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Keith Packard not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Keith Packard makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

KEITH

PACKARD DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL KEITH PACKARD BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (c) 2007-2009, Troy D. Hanson
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright 1992, 1993 by TOSHIBA Corp.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of TOSHIBA not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. TOSHIBA make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

TOSHIBA DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL TOSHIBA BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright IBM Corporation 1993

All Rights Reserved

License to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted,

provided that the above copyright notice appear in all copies and that both

that copyright notice and this permission notice appear in supporting documentation, and that the name of IBM not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

IBM DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY, FITNESS, AND NON-INFRINGEMENT OF THIRD PARTY RIGHTS, IN NO EVENT SHALL IBM BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1990, 1991 by OMRON Corporation, NTT Software Corporation,
and Nippon Telegraph and Telephone Corporation

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of OMRON, NTT Software, and NTT not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. OMRON, NTT Software, and NTT make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

OMRON, NTT SOFTWARE, AND NTT, DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL OMRON, NTT SOFTWARE, OR NTT, BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

This notice applies to the files in this directory. They are taken from the libiconv-1.1 package, which is covered by the LGPL license. The files in this directory have been placed under the following copyright, with permission from the Free Software Foundation.

Copyright (c) 1999-2000 Free Software Foundation, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE FREE SOFTWARE FOUNDATION BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the Free Software Foundation shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the Free Software Foundation.

Notes:

1. This copyright applies only to the files in this directory, and not to the remaining files in libiconv.
2. The Free Software Foundation does not encourage the use of the above license for newly written software.

1.35 libxml2 2.7.6

1.35.1 Available under license :

Except where otherwise noted in the source code (e.g. the files hash.c, list.c and the trio files, which are covered by a similar licence but with different Copyright notices) all the files are:

Copyright (C) 1998-2012 Daniel Veillard. All Rights Reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is fur-

nished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.36 rpm 4.8.0

1.36.1 Available under license :

RPM is covered under two separate licenses.

The entire code base may be distributed under the terms of the GNU General Public License (GPL), which appears immediately below. Alternatively, all of the source code in the lib subdirectory of the RPM source code distribution as well as any code derived from that code may instead be distributed under the GNU Library General Public License (LGPL), at the choice of the distributor. The complete text of the LGPL appears at the bottom of this file.

This alternative is provided to enable applications to be linked against the RPM library (commonly called librpm) without forcing such applications to be distributed under the GPL.

Any questions regarding the licensing of RPM should be addressed to rpm-maint@lists.rpm.org

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675

Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and

modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under

the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further

restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will

be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These
Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
```

`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software
Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some
specially designated Free Software Foundation software, and to any
other libraries whose authors decide to use it. You can use it for
your libraries, too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses are designed to make sure that you
have the freedom to
distribute copies of free software (and charge for
this service if you wish), that you receive source code or can get it
if you want it, that you can change the software or use pieces of it
in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid
anyone to deny you these rights or to ask you to surrender the rights.
These restrictions translate to certain responsibilities for you if

you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively

promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means

all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the

application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany

it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse

engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials

specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary

libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You

may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number

of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting

redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

```
<signature of Ty Coon>, 1 April 1990  
Ty Coon, President of Vice
```

That's all there is to it!

1.37 gdkpixbuf 2.18.9

1.37.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who
decide to use it. You
can use it too, but we suggest you first think carefully about whether
this license or the ordinary General Public License is the better
strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of
it in new free programs; and that you are informed that you can do
these things.

To protect your rights, we need to make restrictions that forbid
distributors to deny you these rights or to ask you to surrender these
rights. These restrictions translate to certain responsibilities for
you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library,
whether gratis
or for a fee, you must give the recipients all the rights that we gave
you. You must make sure that they, too, receive or can get the source
code. If you link other code with the library, you must provide
complete object files to the recipients, so that they can relink them
with the library after making changes to the library and recompiling
it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the
library, and (2) we offer you this license, which gives you legal

permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting

the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation

and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any

application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding

machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse

engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)
- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is

normally

distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the

Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey

the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

1.38 tar 1.2.11

1.38.1 Available under license :

Copyright (c) 1998-2003 University of Illinois Board of Trustees

Copyright (c) 1998-2003 Mark D. Roth

All rights reserved.

Developed by: Campus Information Technologies and Educational Services,
University of Illinois at Urbana-Champaign

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the ``Software"), to deal with the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimers.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimers in the documentation and/or other materials provided with the distribution.
- * Neither the names of Campus Information Technologies and Educational Services, University of Illinois at Urbana-Champaign, nor the names of its contributors may be used to endorse or promote products derived from this Software without specific prior written permission.

THE SOFTWARE IS PROVIDED ``AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE CONTRIBUTORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS WITH THE SOFTWARE.

1.39 libxcursor 1.1.14

1.39.1 Available under license :

Copyright 2002 Keith Packard

Permission to use, copy, modify, distribute, and sell this software and its

documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Keith Packard not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Keith Packard makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

KEITH PACKARD DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL KEITH PACKARD BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

1.40 libxdmcp 1.1.1-6.1.el7

1.40.1 Available under license :

Copyright 1989, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from The Open Group.

Author: Keith Packard, MIT X Consortium

1.41 libssh2 1.2.2

1.41.1 Available under license :

```
/* Copyright (c) 2004-2007 Sara Golemon <sarag@libssh2.org>
* Copyright (c) 2005,2006 Mikhail Gusarov <dottedmag@dottedmag.net>
* Copyright (c) 2006-2007 The Written Word, Inc.
* Copyright (c) 2007 Eli Fant <elifantu@mail.ru>
* Copyright (c) 2009-2014 Daniel Stenberg
* Copyright (C) 2008, 2009 Simon Josefsson
* All rights reserved.
*
* Redistribution and use in source and binary forms,
* with or without modification, are permitted provided
* that the following conditions are met:
*
* Redistributions of source code must retain the above
* copyright notice, this list of conditions and the
* following disclaimer.
*
* Redistributions in binary form must reproduce the above
* copyright notice, this list of conditions and the following
* disclaimer in the documentation and/or other materials
* provided with the distribution.
*
* Neither the name of the copyright holder nor the names
* of any other contributors may be used to endorse or
* promote products
derived from this software without
* specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND
* CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES,
* INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES
* OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR
* CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
* SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING,
* BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR
* SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS
* INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
* WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING
* NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE
* USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY
* OF SUCH DAMAGE.
*/
```

1.42 libsm 1.2.2

1.42.1 Available under license :

Copyright (c) 2002, Oracle and/or its affiliates. All rights reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice (including the next paragraph) shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright 1993, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be used in advertising or otherwise to promote the sale, use or other dealings

in this Software without prior written authorization from The Open Group.

1.43 sg3-utils 2.0

1.43.1 Available under license :

Copyright (c) 1999-2018, Douglas Gilbert
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 1999-2019, Douglas Gilbert
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES

(INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Above is the:

SPDX-License-Identifier: BSD-2-Clause

Copyright (c) 1999-2022, Douglas Gilbert

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Above is the:

SPDX-License-Identifier: BSD-2-Clause

Copyright (c) 1999-2022, Douglas Gilbert

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation

and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Above is the:

SPDX-License-Identifier: BSD-2-Clause

Upstream Authors: Douglas Gilbert <dgilbert at interlog dot com>,
Bruce Allen <ballen at gravity dot phys dot uwm dot edu>,
Peter Allworth <linsol at zeta dot org dot au>,
James Bottomley <jejb at parisc-linux dot org>,
Lars Marowsky-Bree <lmb at suse dot de>,
Kurt Garloff,
Grant Grundler <grundler at parisc-linux dot org>,
Christophe Varoqui <christophe dot varoqui at free dot fr>,
Michael Weller <eowmob at exp-math dot uni-essen dot de>,
Eric Youngdale <eric at andante dot org>

Copyright:

This software is copyright(c) 1994-2021 by the authors

Most of the code in this package is covered by a BSD license.
On Debian systems, the complete text of the BSD License
can be found in `~/usr/share/common-licenses/BSD'`. All the code
in the library (usually called libsgutils) is covered by a
BSD license.

Some of the older utilities

are covered by the GPL. More precisely:

You are free to distribute this software under the terms of the
GNU General Public License either version 2, or (at your option)
any later version. On Debian systems, the complete text of the GNU
General Public License can be found in `/usr/share/common-licenses/GPL-2`
file. The later GPL-3 is found in `/usr/share/common-licenses/GPL-3`
file but no code in this package refers to that license.

Douglas Gilbert

1.44 linux-kernel 3.4.49.0.1

1.44.1 Available under license :

Copyright (c) 2009-2013 QLogic Corporation
QLogic Linux qlcnic NIC Driver

You may modify and redistribute the device driver code under the GNU General Public License (a copy of which is attached hereto as Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have.

You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program).

Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1

above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition,

mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If

distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as

distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented

by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

Except as contained in this notice, the names of above-listed copyright holders and the names of any contributors shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS OR CONTRIBUTORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Alternatively, this software may be distributed under the terms of the GNU General Public License ("GPL") version 2 as published

by the Free Software Foundation.

As a special exception, if other files instantiate templates or use macros or inline functions from this file, or you compile this file and link it with other works to produce a work based on this file, this file does not by itself cause the resulting work to be covered by the GNU General Public License. However the source code for this file must still be made available in accordance with section (3) of the GNU General Public License.

This exception does not invalidate any other reasons why a work based on this file might be covered by the GNU General Public License.

Copyright (c) 2003-2013 QLogic Corporation
QLogic Linux FC-FCoE Driver

This program includes a device driver for Linux 3.x.
You may modify and redistribute the device driver code under the GNU General Public License (a copy of which is attached hereto as Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you

have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another

language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a

special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works.

These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software

Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free

programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

Contributors to bttv:

Michael Chu <mmchu@pobox.com>
AverMedia fix and more flexible card recognition

Alan Cox <alan@lxorguk.ukuu.org.uk>
Video4Linux interface and 2.1.x kernel adaptation

Chris Kleitsch
Hardware I2C

Gerd Knorr <kraxel@cs.tu-berlin.de>
Radio card (ITT sound processor)

bigfoot <bigfoot@net-way.net>
Ragnar Hojland Espinosa <ragnar@macula.net>
ConferenceTV card

+ many more (please mail me if you are missing in this list and would like to be mentioned)

TI DSP/Bridge Driver - Contributors File

The DSP/Bridge project wish to thank all of its contributors, current bridge driver is the result of the work of all of them. If any name is accidentally omitted, let us know by sending a mail to omar.ramirez@ti.com or x095840@ti.com.

Please keep the following list in alphabetical order.

Suman Anna
Sripal Bagadia
Felipe Balbi
Ohad Ben-Cohen
Phil Carmody
Deepak Chitriki
Felipe Contreras
Hiroshi Doyu
Seth Forshee
Ivan Gomez Castellanos
Mark Grosen
Ramesh Gupta G
Fernando Guzman Lugo
Axel Haslam
Janet Head
Shivananda Hebbar
Hari Kanigeri
Tony Lindgren
Antonio Luna
Hari Nagalla
Nishanth Menon
Ameya Palande
Vijay Pasam
Gilbert Pitney
Omar Ramirez Luna
Ernesto Ramos
Chris Ring
Larry Schiefer
Rebecca Schultz Zavin
Bhavin Shah
Andy Shevchenko
Jeff Taylor
Roman Tereshonkov
Armando Uribe de Leon
Nischal Varide
Wenbiao Wang

```

/* nicstar.c v0.22 Jawaid Bazyar (bazyar@hypermall.com)
* nicstar.c, M. Welsh (matt.welsh@cl.cam.ac.uk)
*
* Hacked October, 1997 by Jawaid Bazyar, Interlink Advertising Services Inc.
* http://www.hypermall.com/
* 10/1/97 - commented out CFG_PHYIE bit - we don't care when the PHY
* interrupts us (except possibly for removal/insertion of the cable?)
* 10/4/97 - began heavy inline documentation of the code. Corrected typos
* and spelling mistakes.
* 10/5/97 - added code to handle PHY interrupts, disable PHY on
* loss of link, and correctly re-enable PHY when link is
* re-established. (put back CFG_PHYIE)
*
* Modified to work with the IDT7721 nicstar -- AAL5 (tested) only.
*
* R. D. Rechenmacher <ron@fnal.gov>, Aug. 6, 1997
*
* Linux driver for the IDT77201 NICStAR PCI ATM controller.
* PHY component is expected to be 155 Mbps S/UNI-Lite or IDT 77155;
* see init_nicstar() for PHY initialization to change this. This driver
* expects the Linux ATM stack to support scatter-gather
lists
* (skb->atm.iovcnt != 0) for Rx skb's passed to vcc->push.
*
* Implementing minimal-copy of received data:
* IDT always receives data into a small buffer, then large buffers
* as needed. This means that data must always be copied to create
* the linear buffer needed by most non-ATM protocol stacks (e.g. IP)
* Fix is simple: make large buffers large enough to hold entire
* SDU, and leave <small_buffer_data> bytes empty at the start. Then
* copy small buffer contents to head of large buffer.
* Trick is to avoid fragmenting Linux, due to need for a lot of large
* buffers. This is done by 2 things:
* 1) skb->destructor / skb->atm.recycle_buffer
*    combined, allow nicstar_free_rx_skb to be called to
*    recycle large data buffers
* 2) skb_clone of received buffers
* See nicstar_free_rx_skb and linearize_buffer for implementation
* details.
*
*
*
* Copyright (c) 1996 University of Cambridge
Computer Laboratory
*
* This program is free software; you can redistribute it and/or modify
* it under the terms of the GNU General Public License as published by
* the Free Software Foundation; either version 2 of the License, or

```


* (at your option) any later version.
*
* This program is distributed in the hope that it will be useful,
* but WITHOUT ANY WARRANTY; without even the implied warranty of
* MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
* GNU General Public License for more details.
*
* You should have received a copy of the GNU General Public License
* along with this program; if not, write to the Free Software
* Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.
*
* M. Welsh, 6 July 1996
*
*
*/

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not

compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY

FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,

or

(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

Copyright (c) 2003-2013 QLogic Corporation
QLogic Linux iSCSI Driver

This program includes a device driver for Linux 3.x.
You may modify and redistribute the device driver code under the GNU General Public License (a copy of which is attached hereto as Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original

authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute

such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works.

These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software

Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE

TO YOU FOR DAMAGES,
INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING
OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED
TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY
YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER
PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE
POSSIBILITY OF SUCH DAMAGES.

Code in this directory written at the IDA Supercomputing Research Center
carries the following copyright and license.

Copyright 1993 United States Government as represented by the
Director, National Security Agency. This software may be used
and distributed according to the terms of the GNU General Public License,
incorporated herein by reference.

In addition to the disclaimers in the GPL, SRC expressly disclaims any
and all warranties, expressed or implied, concerning the enclosed software.
This software was developed at SRC for use in internal research, and the
intent in sharing this software is to promote the productive interchange
of ideas throughout the research community. All software is furnished
on an "as-is" basis. No further updates to this software should be
expected. Although updates may occur, no commitment exists.

Copyright (c) 2003-2006, Marvell International Ltd.

All Rights Reserved

This program is free software; you can redistribute it and/or modify it
under the terms of version 2 of the GNU General Public License as
published by the Free Software Foundation.

This program is distributed in the hope that it will be useful, but WITHOUT
ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for
more details.

You should have received a copy of the GNU General Public License along with
this program; if not, write to the Free Software Foundation, Inc., 59
Temple Place - Suite 330, Boston, MA 02111-1307, USA.

"This software program is licensed subject to the GNU General Public License
(GPL). Version 2, June 1991, available at
<http:

GNU General Public License

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program

proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies

to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

* a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

* b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties

under the terms of this License.

- * c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- * a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- * b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

*

- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.
5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.
6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not

responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

one line to give the program's name and an idea of what it does.

Copyright (C) yyyy name of author

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type 'show w'. This is free software, and you are welcome to redistribute it under certain conditions; type 'show c' for details.

The hypothetical commands 'show w' and 'show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than 'show w' and 'show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program 'Gnomovision' (which makes passes at compilers) written by James Hacker.

signature

of Ty Coon, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide

complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the

libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of

running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must

be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy

from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a

copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library

facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you

may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

The files in this directory and elsewhere which refer to this LICENCE file are part of JFFS2, the Journalling Flash File System v2.

Copyright 2001-2007 Red Hat, Inc. and others

JFFS2 is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 or (at your option) any later version.

JFFS2 is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with JFFS2; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA.

As a special exception, if other files instantiate templates or use macros or inline functions from these files, or you compile these files and link them with other works to produce a work based on these files, these files do not by themselves cause the resulting work to be covered by the GNU General Public License. However the source code for these files must still be made available in accordance with section (3) of the GNU General Public License.

This exception does not invalidate any other reasons why a work based on this file might be covered by the GNU General Public License.

Copyright (c) 2003-2006 QLogic Corporation
QLogic Linux Networking HBA Driver

This program includes a device driver for Linux 2.6 that may be distributed with QLogic hardware specific firmware binary file. You may modify and redistribute the device driver code under the GNU General Public License as published by the Free Software Foundation (version 2 or a later version).

You may redistribute the hardware specific firmware binary file under the following terms:

1. Redistribution of source code (only if applicable), must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistribution in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of QLogic Corporation may not be used to endorse or promote products derived from this software without specific prior written permission

REGARDLESS

OF WHAT LICENSING MECHANISM IS USED OR APPLICABLE, THIS PROGRAM IS PROVIDED BY QLOGIC CORPORATION "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED

TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

USER ACKNOWLEDGES AND AGREES THAT USE OF THIS PROGRAM WILL NOT CREATE OR GIVE GROUNDS FOR A LICENSE BY IMPLICATION, ESTOPPEL, OR OTHERWISE IN ANY INTELLECTUAL PROPERTY RIGHTS (PATENT, COPYRIGHT, TRADE SECRET, MASK WORK, OR OTHER PROPRIETARY RIGHT) EMBODIED IN ANY OTHER QLOGIC HARDWARE OR SOFTWARE EITHER SOLELY OR IN COMBINATION WITH THIS PROGRAM.

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of

packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works

for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a

copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent

the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you

must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and

propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or

that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's

public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it

free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to

do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>. Thanks go to the following people for patches and contributions:

Michael Hunold <m.hunold@gmx.de>
for the initial saa7146 driver and its recent overhaul

Christian Theiss
for his work on the initial Linux DVB driver

Marcus Metzler <mocm@metzlerbros.de>
Ralph Metzler <rjkm@metzlerbros.de>
for their continuing work on the DVB driver

Michael Holz <kju@debian.org>
for his contributions to the dvb-net driver

Diego Picciani <d.picciani@novacomp.it>
for CyberLogin for Linux which allows logging onto EON
(in case you are wondering where CyberLogin is, EON changed its login procedure and CyberLogin is no longer used.)

Martin Schaller <martin@smurf.franken.de>
for patching the cable card decoder driver

Klaus Schmidinger <Klaus.Schmidinger@cadsoft.de>
for various fixes regarding tuning, OSD and CI stuff and his work on VDR

Steve Brown <sbrown@cortland.com>
for his AFC kernel thread

Christoph Martin <martin@uni-mainz.de>
for his LIRC infrared handler

Andreas Oberritter
<obi@linuxtv.org>

Dennis Noermann <dennis.noermann@noernet.de>

Felix Domke <tmbinc@elitedvb.net>

Florian Schirmer <jolt@tuxbox.org>

Ronny Strutz <3des@elitedvb.de>

Wolfram Joost <dbox2@frokaschwei.de>

...and all the other dbox2 people

for many bugfixes in the generic DVB Core, frontend drivers and their work on the dbox2 port of the DVB driver

Oliver Endriss <o.endriss@gmx.de>
for many bugfixes

Andrew de Quincey <adq_dvb@lidskialf.net>
for the tda1004x frontend driver, and various bugfixes

Peter Schildmann <peter.schildmann@web.de>
for the driver for the Technisat SkyStar2 PCI DVB card

Vadim Catana <skystar@moldova.cc>
Roberto Ragusa <r.ragusa@libero.it>
Augusto Cardoso <augusto@carhil.net>
for all the work for the FlexCopII chipset by B2C2,Inc.

Davor Emard <emard@softhome.net>
for his work on the budget drivers, the demux code,
the module unloading problems, ...

Hans-Frieder Vogt <hfvogt@arcor.de>
for his work on calculating and checking the crc's for the

TechnoTrend/Hauppage DEC driver firmware

Michael Dreher <michael@5dot1.de>
Andreas 'randy' Weinberger
for the support of the Fujitsu-Siemens Activy budget DVB-S

Kenneth Aafly <ke-aa@frisurf.no>
for adding support for Typhoon DVB-S budget card

Ernst Peinlich <e.peinlich@inode.at>
for tuning/DiSEqC support for the DEC 3000-s

Peter Beutner <p.beutner@gmx.net>
for the IR code for the ttusb-dec driver

Wilson Michaels <wilsonmichaels@earthlink.net>
for the lgdt330x frontend driver, and various bugfixes

Michael Krufky <mkrufky@m1k.net>
for maintaining v4l/dvb inter-tree dependencies

Taylor Jacob <rtjacob@earthlink.net>
for the nxt2002 frontend driver

Jean-Francois Thibert <jeanfrancois@sagetv.com>
for the nxt2004 frontend driver

Kirk Lapray <kirk.lapray@gmail.com>
for the or51211 and or51132 frontend drivers, and

for merging the next2002 and next2004 modules into a single next200x frontend driver.

(If you think you should be in this list, but you are not, drop a line to the DVB mailing list)

NOTE! This copyright does **not** cover user programs that use kernel services by normal system calls - this is merely considered normal use of the kernel, and does **not** fall under the heading of "derived work". Also note that the GPL below is copyrighted by the Free Software Foundation, but the instance of code that it refers to (the Linux kernel) is copyrighted by me and others who actually wrote it.

Also note that the only valid version of the GPL as far as the kernel is concerned is this particular version of the license (ie v2, not v2.2 or v3.x or whatever), unless explicitly otherwise stated.

Linus Torvalds

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is

to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not

covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you

distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component

itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License.

However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein.

You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals

of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer)
or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

```
Copyright (c) 2003-2011 QLogic Corporation  
QLogic Linux qlge NIC Driver
```

You may modify and redistribute the device driver code under the
GNU General Public License (a copy of which is attached hereto as
Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain

that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1

above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but

does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it,

under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not

signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR

REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

FlashPoint Driver Developer's Kit
Version 1.0

Copyright 1995-1996 by Mylex Corporation
All Rights Reserved

This program is free software; you may redistribute and/or modify it under the terms of either:

a) the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version,

or

b) the "BSD-style License" included below.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY, without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See either the GNU General Public License or the BSD-style License below for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

The BSD-style License is as follows:

Redistribution

and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain this LICENSE.FlashPoint file, without modification, this list of conditions, and the following disclaimer. The following copyright notice must appear immediately at the beginning of all source files:

Copyright 1995-1996 by Mylex Corporation. All Rights Reserved

This file is available under both the GNU General Public License

and a BSD-style copyright; see LICENSE.FlashPoint for details.

2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of Mylex Corporation may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE

IS PROVIDED BY MYLEX CORP. ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.45 pycurl 7.19.0

1.45.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the

Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the

ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must

be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or

collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that

uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood

that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to

refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our

decision

will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey

the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!
COPYRIGHT AND PERMISSION NOTICE

Copyright (C) 2001-2008 by Kjetil Jacobsen <kjetilja at gmail.com>
Copyright (C) 2001-2008 by Markus F.X.J. Oberhumer <markus at oberhumer.com>

All rights reserved.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT OF THIRD PARTY RIGHTS. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of a copyright holder shall not

be used in advertising or otherwise
to promote the sale, use or other dealings
in this Software without prior written authorization of the copyright holder.

1.46 libnl3 3.2.21

1.46.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who
decide to use it. You
can use it too, but we suggest you first think carefully about whether
this license or the ordinary General Public License is the better
strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of
it in new free programs; and that you are informed that you can do
these things.

To protect your rights, we need to make restrictions that forbid
distributors to deny you these rights or to ask you to surrender these
rights. These restrictions translate to certain responsibilities for
you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages

are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under

copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a

table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary

GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all

subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the

object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany

the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above

specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or

distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE,

BE LIABLE TO YOU
FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR
CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE
LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING
RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A
FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF
SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH
DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.47 tcp-wrappers 7.6-57.el6

1.47.1 Available under license :

```
/*  
* Copyright 1995 by Wietse Venema. All rights reserved. Some individual  
* files may be covered by other copyrights.  
*  
* This material was originally written and compiled by Wietse Venema at  
* Eindhoven University of Technology, The Netherlands, in 1990, 1991,  
* 1992, 1993, 1994 and 1995.  
*  
* Redistribution and use in source and binary forms are permitted  
* provided that this entire copyright notice is duplicated in all such  
* copies.  
*  
* This software is provided "as is" and without any expressed or implied  
* warranties, including, without limitation, the implied warranties of  
* merchantability and fitness for any particular purpose.  
*/
```

1.48 libart 2.3.20-5.1.el6

1.48.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your

freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must

be licensed for everyone's
free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and

distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under

the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not.

Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials

specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies,

or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE

LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year>
<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.49 openssh 5.3p1

1.49.1 Notifications :

This product includes software developed by the OpenSSL Project for use in the OpenSSL Toolkit (<http://www.openssl.org/>)

This product includes cryptographic software written by Eric Young (ey@cryptsoft.com).

This product includes software written by Tim Hudson (tjh@cryptsoft.com).

1.49.2 Available under license :

This file is part of the OpenSSH software.

The licences which components of this software fall under are as follows. First, we will summarize and say that all components are under a BSD licence, or a licence more free than that.

OpenSSH contains no GPL code.

1)

* Copyright (c) 1995 Tatu Ylonen <ylo@cs.hut.fi>, Espoo, Finland

* All rights reserved

*

* As far as I am concerned, the code I have written for this software

* can be used freely for any purpose. Any derived versions of this

* software must be clearly marked as such, and if the derived work is

* incompatible with the protocol description in the RFC file, it must be

* called by a name other than "ssh" or "Secure Shell".

[Tatu continues]

* However, I am not implying to give any licenses to any patents or

* copyrights held by third parties, and the software includes parts that

* are not under my direct control. As far as I know, all included

- * source code is used in accordance with the relevant license agreements
- * and can be used freely for any purpose (the GNU license being the most
- * restrictive); see below for details.

[However, none of that term is relevant at this point in time. All of these restrictively licenced software components which he talks about have been removed from OpenSSH, i.e.,

- RSA is no longer included, found in the OpenSSL library
- IDEA is no longer included, its use is deprecated
- DES is now external, in the OpenSSL library
- GMP is no longer used, and instead we call BN code from OpenSSL
- Zlib is now external, in a library
- The make-ssh-known-hosts script is no longer included
- TSS has been removed
- MD5 is now external, in the OpenSSL library
- RC4 support has been replaced with ARC4 support from OpenSSL
- Blowfish is now external, in the OpenSSL library

[The licence continues]

Note that any information and cryptographic algorithms used in this software are publicly available on the Internet and at any major bookstore, scientific library, and patent office worldwide. More information can be found e.g. at "<http://www.cs.hut.fi/crypto>".

The legal status of this program is some combination of all these permissions and restrictions. Use only at your own responsibility. You will be responsible for any legal consequences yourself; I am not making any claims whether possessing or using this is legal or not in your country, and I am not taking any responsibility on your behalf.

NO WARRANTY

BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING

WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

2)

The 32-bit CRC compensation attack detector in deattack.c was contributed by CORE SDI S.A. under a BSD-style license.

* Cryptographic attack detector for ssh - source code

*

* Copyright (c) 1998 CORE SDI S.A., Buenos Aires, Argentina.

*

* All rights reserved. Redistribution and use in source and binary forms, with or without modification, are permitted provided that this copyright notice is retained.

*

* THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES ARE DISCLAIMED. IN NO EVENT SHALL CORE SDI S.A. BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY OR CONSEQUENTIAL DAMAGES RESULTING FROM THE USE OR MISUSE OF THIS SOFTWARE.

*

* Ariel Futoransky <futo@core-sdi.com>

* <<http://www.core-sdi.com>>

3)

ssh-keyscan was contributed by David Mazieres under a BSD-style license.

* Copyright 1995, 1996 by David Mazieres <dm@lcs.mit.edu>.

*

* Modification and redistribution in source and binary forms is permitted

provided that due credit is given to the author and the

* OpenBSD project by leaving this copyright notice intact.

4)

The Rijndael implementation by Vincent Rijmen, Antoon Bosselaers and Paulo Barreto is in the public domain and distributed with the following license:

* @version 3.0 (December 2000)

```

*
* Optimised ANSI C code for the Rijndael cipher (now AES)
*
* @author Vincent Rijmen <vincent.rijmen@esat.kuleuven.ac.be>
* @author Antoon Bosselaers <antoon.bosselaers@esat.kuleuven.ac.be>
* @author Paulo Barreto <paulo.barreto@terra.com.br>
*
* This code is hereby placed in the public domain.
*
* THIS SOFTWARE IS PROVIDED BY THE AUTHORS "AS IS" AND ANY EXPRESS
* OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED
* WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHORS OR CONTRIBUTORS BE
* LIABLE FOR ANY DIRECT, INDIRECT,
INCIDENTAL, SPECIAL, EXEMPLARY, OR
* CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF
* SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR
* BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
* WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE
* OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE,
* EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

```

5)

One component of the ssh source code is under a 3-clause BSD license, held by the University of California, since we pulled these parts from original Berkeley code.

```

* Copyright (c) 1983, 1990, 1992, 1993, 1995
*   The Regents of the University of California. All rights reserved.
*
* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:
* 1. Redistributions of source code must retain
the above copyright
*   notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
*   notice, this list of conditions and the following disclaimer in the
*   documentation and/or other materials provided with the distribution.
* 3. Neither the name of the University nor the names of its contributors
*   may be used to endorse or promote products derived from this software
*   without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

```


* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

6)

Remaining components of the software are provided under a standard 2-term BSD licence with the following names as copyright holders:

Markus Friedl
Theo de Raadt
Niels Provos
Dug Song
Aaron Campbell
Damien Miller
Kevin Steves
Daniel Kouril
Wesley Griffin
Per Allansson
Nils Nordman
Simon Wilkinson

Portable OpenSSH additionally includes code from the following copyright holders, also under the 2-term BSD license:

Ben Lindstrom
Tim Rice
Andre Lucas
Chris Adams
Corinna Vinschen
Cray Inc.
Denis Parker
Gert Doering
Jakob Schlyter
Jason Downs
Juha Yrjl
Michael Stone
Networks Associates Technology,
Inc.
Solar Designer
Todd C. Miller
Wayne Schroeder
William Jones
Darren Tucker
Sun Microsystems

The SCO Group

Daniel Walsh

- * Redistribution and use in source and binary forms, with or without
- * modification, are permitted provided that the following conditions
- * are met:
- * 1. Redistributions of source code must retain the above copyright
- * notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer in the
- * documentation and/or other materials provided with the distribution.
- *
- * THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR
- * IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES
- * OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED.
- * IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT,
- * INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT
- * NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE,
- * DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY
- * THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT
- * (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF
- * THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

8) Portable OpenSSH contains the following additional licenses:

a) md5crypt.c, md5crypt.h

- * "THE BEER-WARE LICENSE" (Revision 42):
- * <phk@login.dknet.dk> wrote this file. As long as you retain this
- * notice you can do whatever you want with this stuff. If we meet
- * some day, and you think this stuff is worth it, you can buy me a
- * beer in return. Poul-Henning Kamp

b) snprintf replacement

- * Copyright Patrick Powell 1995
- * This code is based on code written by Patrick Powell
- * (papowell@astart.com) It
- may be used for any purpose as long as this
- * notice remains intact on all source code distributions

c) Compatibility code (openbsd-compat)

Apart from the previously mentioned licenses, various pieces of code in the openbsd-compat/ subdirectory are licensed as follows:

Some code is licensed under a 3-term BSD license, to the following copyright holders:

Todd C. Miller
Theo de Raadt
Damien Miller
Eric P. Allman
The Regents of the University of California
Constantin S. Svintsoff

* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:

* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials
provided with the distribution.

* 3. Neither the name of the University nor the names of its contributors
* may be used to endorse or promote products derived from this software
* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH
DAMAGE.

Some code is licensed under an ISC-style license, to the following
copyright holders:

Internet Software Consortium.
Todd C. Miller
Reyk Floeter
Chad Mynhier

* Permission to use, copy, modify, and distribute this software for any
* purpose with or without fee is hereby granted, provided that the above
* copyright notice and this permission notice appear in all copies.

*

* THE SOFTWARE IS PROVIDED "AS IS" AND TODD C. MILLER DISCLAIMS ALL
* WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES

* OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL TODD C. MILLER BE LIABLE
* FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES
* WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION
* OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN
* CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Some code is licensed under a MIT-style license to the following

copyright holders:

Free Software Foundation, Inc.

* Permission is hereby granted, free of charge, to any person obtaining a *
* copy of this software and associated documentation files (the *
* "Software"), to deal in the Software without restriction, including *
* without limitation the rights to use, copy, modify, merge, publish, *
* distribute, distribute with modifications, sublicense, and/or sell *
* copies of the Software, and to permit persons to whom the Software is *
* furnished to do so, subject to the following conditions: *
* *
* The above copyright notice and this permission notice shall be included *
* in all copies or substantial portions of the Software. *
* *
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS *
* OR IMPLIED,
INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF *
* MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. *
* IN NO EVENT SHALL THE ABOVE COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, *
* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR *
* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR *
* THE USE OR OTHER DEALINGS IN THE SOFTWARE. *
* *
* Except as contained in this notice, the name(s) of the above copyright *
* holders shall not be used in advertising or otherwise to promote the *
* sale, use or other dealings in this Software without prior written *
* authorization. *

*****/

\$OpenBSD: LICENCE,v 1.19 2004/08/30 09:18:08 markus Exp \$

/* =====

* Copyright (c) 1998-2001 The OpenSSL Project. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

*

- * 1. Redistributions of source code must retain the above copyright
- * notice, this list of conditions and the following disclaimer.
- *
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer in
- * the documentation and/or other materials provided with the
- * distribution.
- *
- * 3. All advertising materials mentioning features or use of this
- * software must display the following acknowledgment:
- * "This product includes software developed by the OpenSSL Project
- * for use in the OpenSSL Toolkit. (<http://www.openssl.org/>)"
- *
- * 4. The names "OpenSSL Toolkit" and "OpenSSL Project" must not be
- used to
- * endorse or promote products derived from this software without
- * prior written permission. For written permission, please contact
- * openssl-core@openssl.org.
- *
- * 5. Products derived from this software may not be called "OpenSSL"
- * nor may "OpenSSL" appear in their names without prior written
- * permission of the OpenSSL Project.
- *
- * 6. Redistributions of any form whatsoever must retain the following
- * acknowledgment:
- * "This product includes software developed by the OpenSSL Project
- * for use in the OpenSSL Toolkit (<http://www.openssl.org/>)"
- *
- * THIS SOFTWARE IS PROVIDED BY THE OpenSSL PROJECT ``AS IS" AND ANY
- * EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
- * IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR
- * PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OpenSSL PROJECT OR
- * ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
- * SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING,
- BUT
- * NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES;
- * LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
- * HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT,
- * STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
- * ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED
- * OF THE POSSIBILITY OF SUCH DAMAGE.
- * =====
- *
- * This product includes cryptographic software written by Eric Young
- * (ey@cryptsoft.com). This product includes software written by Tim
- * Hudson (tjh@cryptsoft.com).
- *
- */

Original SSLeay License

```
-----  
  
/* Copyright (C) 1995-1998 Eric Young (eay@cryptsoft.com)  
* All rights reserved.  
*  
* This package is an SSL implementation written  
* by Eric Young (eay@cryptsoft.com).  
* The implementation was written so as to conform with Netscapes SSL.  
*  
* This library is free for commercial and non-commercial use as long  
* as  
* the following conditions are aheared to. The following conditions  
* apply to all code found in this distribution, be it the RC4, RSA,  
* lhash, DES, etc., code; not just the SSL code. The SSL documentation  
* included with this distribution is covered by the same copyright terms  
* except that the holder is Tim Hudson (tjh@cryptsoft.com).  
*  
* Copyright remains Eric Young's, and as such any Copyright notices in  
* the code are not to be removed.  
* If this package is used in a product, Eric Young should be given attribution  
* as the author of the parts of the library used.  
* This can be in the form of a textual message at program startup or  
* in documentation (online or textual) provided with the package.  
*  
* Redistribution and use in source and binary forms, with or without  
* modification, are permitted provided that the following conditions  
* are met:  
* 1. Redistributions of source code must retain the copyright  
* notice, this list of conditions and the following  
* disclaimer.  
* 2. Redistributions in binary form must reproduce the above copyright  
* notice, this list of conditions and the following disclaimer in the  
* documentation and/or other materials provided with the distribution.  
* 3. All advertising materials mentioning features or use of this software  
* must display the following acknowledgement:  
* "This product includes cryptographic software written by  
* Eric Young (eay@cryptsoft.com)"  
* The word 'cryptographic' can be left out if the rouines from the library  
* being used are not cryptographic related :-).  
* 4. If you include any Windows specific code (or a derivative thereof) from  
* the apps directory (application code) you must include an acknowledgement:  
* "This product includes software written by Tim Hudson (tjh@cryptsoft.com)"  
*  
* THIS SOFTWARE IS PROVIDED BY ERIC YOUNG ``AS IS" AND  
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE  
* IMPLIED WARRANTIES OF MERCHANTABILITY
```

AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.

*

* The licence and distribution terms for any publically available version or
* derivative of this code cannot be changed. i.e. this code cannot simply be
* copied and put under another distribution licence
* [including the GNU Public Licence.]

*/

This package was debianized by Jamie Beverly <soupboy@sourceforge.net> on
Wed, 13 Jan 2010 01:08:49 +0300.

It was downloaded from <http://pamsshagentauth.sf.net/>

Copyright:

Copyright (C) 2009 Jamie Beverly

License:

Redistribution and use in source and binary forms, with or without
modification, are permitted under the terms of the BSD License.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING
NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

On Debian systems, the complete text of the BSD License can be
found in `~/usr/share/common-licenses/BSD`.

The Debian packaging is copyright 2010, Jamie Beverly <soupboy@sourceforge.net> and
is licensed under the GPL, see `~/usr/share/common-licenses/GPL-2`.

- * Foremost, OpenSSH from which this project is derived.
- * Jamie Beverly
- * Rafael D'Halleweyn - 2011-06-05 18:56:24 EDT

1.50 Idb 1.3.6

1.50.1 Available under license :

Copyright (c) 1998 Red Hat Software

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the X Consortium shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the X Consortium.

1.51 libpciaccess 0.13.4

1.51.1 Available under license :

(C) Copyright IBM Corporation 2006, 2007

(C) Copyright Eric Anholt 2006

(C) Copyright Mark Kettenis 2011

(C) Copyright Robert Millan 2012

Copyright (c) 2007, 2008, 2009, 2011, 2012, 2013 Oracle and/or its affiliates.

Copyright 2009, 2012 Red Hat, Inc.

All Rights Reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation on the rights to use, copy, modify, merge, publish, distribute, sub license,

and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice (including the next paragraph) shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL IBM AND/OR THEIR SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright (c) 2008 Juan Romero Pardines
Copyright (c) 2008, 2011 Mark Kettenis
Copyright (c) 2009 Michael Lorenz
Copyright (c) 2009, 2012 Samuel Thibault

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND THE AUTHOR DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (C) 2000 The XFree86 Project, Inc. All Rights Reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in

all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS",
WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE
XFREE86 PROJECT BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER
IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN
CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the XFree86 Project shall
not be used in advertising or otherwise to promote the sale, use or other
dealings in this Software without prior written authorization from the
XFree86 Project.

Copyright (c) 2007 Paulo R. Zanoni, Tiago Vignatti
Copyright (c) 2009 Tiago Vignatti

Permission is hereby granted, free of charge, to any person
obtaining a copy of this software and associated documentation
files (the "Software"), to deal in the Software without
restriction,
including without limitation the rights to use,
copy, modify, merge, publish, distribute, sublicense, and/or sell
copies of the Software, and to permit persons to whom the
Software is furnished to do so, subject to the following
conditions:

The above copyright notice and this permission notice shall be
included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES
OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND
NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT
HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
OTHER DEALINGS IN THE SOFTWARE.

1.52 libgcrypt 1.5.3

1.52.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we

want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and

distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are

prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each

time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING

OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN
IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GNU LESSER GENERAL PUBLIC LICENSE Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better

strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use

this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library

with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete

corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute

the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a)

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the

Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited

by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to

apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing

and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library.

It is safest to attach them to the start of each source file to most

effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or

modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.53 firstaidkit 0.3.2

1.53.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software

Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a

notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or

executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number

of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.54 distribute 0.6.10

1.54.1 Available under license :

=====
Contributors
=====

- * Alex Grnholm
- * Alice Bevan-McGregor
- * Arfrever Frehtes Taifersar Arahesis
- * Daniel Stutzbach
- * Hanno Schlichting
- * Jannis Leidel
- * Lennart Regebro
- * Martin von Lwis
- * Philip Jenvey
- * Reinout van Rees
- * Tarek Ziad

If you think you name is missing, please add it (alpha order by first name)

1.55 dosfs-tools 3.0.9-4.el6

1.55.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for
software and other kinds of works.

The licenses for most software and other practical works are designed
to take away your freedom to share and change the works. By contrast,
the GNU General Public License is intended to guarantee your freedom to
share and change all versions of a program--to make sure it remains free

software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

- (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents.

States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the

work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately

publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any
non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all
recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey,
and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to
produce it from the Program, in the form of source code under the
terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified
it, and giving a relevant date.

- b) The work must carry prominent notices stating that it is
released under this License and any conditions added under section
7. This requirement modifies the requirement in section
4 to
"keep intact all notices".

- c) You must license the entire work, as a whole, under this
License to anyone who comes into possession of a copy. This
License will therefore apply, along with any applicable section 7
additional terms, to the whole of the work, and all its parts,
regardless of how they are packaged. This License gives no
permission to license the work in any other way, but it does not
invalidate such permission if you have separately received it.

- d) If the work has interactive user interfaces, each must display
Appropriate Legal Notices; however, if the Program has interactive
interfaces that do not display Appropriate Legal Notices, your
work need not make them do so.

A compilation of a covered work with other separate and independent
works, which are not by their nature extensions of the covered work,
and which are not combined with it such as to form a larger program,
in or on a volume of a storage or distribution
medium, is called an
"aggregate" if the compilation and its resulting copyright are not
used to limit the access or legal rights of the compilation's users
beyond what the individual works permit. Inclusion of a covered work
in an aggregate does not cause this License to apply to the other
parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.
- e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no

charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright

holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered

work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF

SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software: you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation, either version 3 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program. If not, see <http://www.gnu.org/licenses/>.
```

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary.

For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

1.56 libtirpc 0.2.4

1.56.1 Available under license :

/*

* Copyright (c) Copyright (c) Bull S.A. 2005 All Rights Reserved.

* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:

* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.

* 3. The name of the author may not be used to endorse or promote products
* derived from this software without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR
* IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES
* OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED.

* IN NO EVENT SHALL THE AUTHOR BE LIABLE
* FOR ANY DIRECT, INDIRECT,

* INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT
* NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE,

* DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY
* THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT

* (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF
* THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.
*/

1.57 iniparse 0.3.1

1.57.1 Available under license :

Copyright (c) 2001, 2002, 2003 Python Software Foundation
Copyright (c) 2004-2008 Paramjit Oberoi <param.cs.wisc.edu>
Copyright (c) 2007 Tim Lauridsen <tla@rasmil.dk>
All Rights Reserved.

iniparse/compat.py and tests/test_compat.py contain code derived from
lib/python-2.3/ConfigParser.py and lib/python-2.3/test/test_cfgparse.py
respectively. Other code may contain small snippets from those two files
as well. The Python license (LICENSE-PSF) applies to that code.

The MIT License

Permission is hereby granted, free of charge, to any person obtaining a
copy of this software and associated documentation files (the "Software"),
to deal in the Software without restriction, including without limitation
the rights to use, copy, modify, merge, publish, distribute, sublicense,
and/or sell copies of the Software, and to permit persons to whom the
Software is furnished to do so, subject to the following conditions:

The
above copyright notice and this permission notice shall be included in
all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
DEALINGS IN THE SOFTWARE.

A. HISTORY OF THE SOFTWARE

=====

Python was created in the early 1990s by Guido van Rossum at Stichting
Mathematisch Centrum (CWI, see <http://www.cwi.nl>) in the Netherlands
as a successor of a language called ABC. Guido remains Python's
principal author, although it includes many contributions from others.

In 1995, Guido continued his work on Python at the Corporation for

National Research Initiatives (CNRI, see <http://www.cnri.reston.va.us>) in Reston, Virginia where he released several versions of the software.

In May 2000, Guido and the Python core development team moved to BeOpen.com to form the BeOpen PythonLabs team. In October of the same year, the PythonLabs team moved to Digital Creations (now Zope Corporation, see <http://www.zope.com>). In 2001, the Python Software Foundation (PSF, see <http://www.python.org/psf/>) was formed, a non-profit organization created specifically to own Python-related Intellectual Property. Zope Corporation is a sponsoring member of the PSF.

All Python releases are Open Source (see <http://www.opensource.org> for the Open Source Definition). Historically, most, but not all, Python releases have also been GPL-compatible; the table below summarizes the various releases.

Release from	Derived from	Year	Owner	GPL-compatible? (1)
0.9.0 thru 1.2		1991-1995	CWI	yes
1.3 thru 1.5.2	1.2	1995-1999	CNRI	yes
1.6	1.5.2	2000	CNRI	no
2.0	1.6	2000	BeOpen.com	no
1.6.1	1.6	2001	CNRI	yes (2)
2.1	2.0+1.6.1	2001	PSF	no
2.0.1	2.0+1.6.1	2001	PSF	yes
2.1.1	2.1+2.0.1	2001	PSF	yes
2.2	2.1.1	2001	PSF	yes
2.1.2	2.1.1	2002	PSF	yes
2.1.3	2.1.2			
2002	PSF	yes		
2.2.1	2.2	2002	PSF	yes
2.2.2	2.2.1	2002	PSF	yes
2.2.3	2.2.2	2003	PSF	yes
2.3	2.2.2	2002-2003	PSF	yes
2.3.1	2.3	2002-2003	PSF	yes
2.3.2	2.3.1	2002-2003	PSF	yes
2.3.3	2.3.2	2002-2003	PSF	yes

Footnotes:

(1) GPL-compatible doesn't mean that we're distributing Python under the GPL. All Python licenses, unlike the GPL, let you distribute a modified version without making your changes open source. The GPL-compatible licenses make it possible to combine Python with

other software that is released under the GPL; the others don't.

(2) According to Richard Stallman, 1.6.1 is not GPL-compatible, because its license has a choice of law clause. According to CNRI, however, Stallman's lawyer has told CNRI's lawyer that 1.6.1 is "not incompatible" with the GPL.

Thanks to the many outside volunteers who have worked under Guido's direction to make these releases possible.

B. TERMS AND CONDITIONS FOR ACCESSING OR OTHERWISE USING PYTHON

PSF LICENSE AGREEMENT FOR PYTHON 2.3

1. This LICENSE AGREEMENT is between the Python Software Foundation ("PSF"), and the Individual or Organization ("Licensee") accessing and otherwise using Python 2.3 software in source or binary form and its associated documentation.

2. Subject to the terms and conditions of this License Agreement, PSF hereby grants Licensee a nonexclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use Python 2.3 alone or in any derivative version, provided, however, that PSF's License Agreement and PSF's notice of copyright, i.e., "Copyright (c) 2001, 2002, 2003 Python Software Foundation; All Rights Reserved" are retained in Python 2.3 alone or in any derivative version prepared by Licensee.

3. In the event Licensee prepares a derivative work that is based on or incorporates Python 2.3 or any part thereof, and wants to make the derivative work available to others as provided herein, then Licensee hereby agrees to include in any such work a brief summary of the changes made to Python 2.3.

4. PSF is making Python 2.3 available to Licensee on an "AS IS" basis. PSF MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, PSF MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF PYTHON 2.3 WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

5. PSF SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF PYTHON

2.3 FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF MODIFYING, DISTRIBUTING, OR OTHERWISE USING PYTHON 2.3, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

6. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

7. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between PSF and Licensee. This License Agreement does not grant permission to use PSF trademarks or trade name in a trademark sense to endorse or promote products or services of Licensee, or any third party.

8. By copying, installing or otherwise using Python 2.3, Licensee agrees to be bound by the terms and conditions of this License Agreement.

BEOPEN.COM LICENSE AGREEMENT FOR PYTHON 2.0

BEOPEN PYTHON OPEN SOURCE LICENSE AGREEMENT VERSION 1

1. This LICENSE AGREEMENT is between BeOpen.com ("BeOpen"), having an office at 160 Saratoga Avenue, Santa Clara, CA 95051, and the Individual or Organization ("Licensee") accessing and otherwise using this software in source or binary form and its associated documentation ("the Software").

2. Subject to the terms and conditions of this BeOpen Python License Agreement, BeOpen hereby grants Licensee a non-exclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use the Software alone or in any derivative version, provided, however, that the BeOpen Python License is retained in the Software, alone or in any derivative version prepared by Licensee.

3. BeOpen is making the Software available to Licensee on an "AS IS" basis. BEOPEN MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, BEOPEN MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF THE SOFTWARE WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

4. BEOPEN SHALL NOT BE LIABLE TO LICENSEE

OR ANY OTHER USERS OF THE SOFTWARE FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF USING, MODIFYING OR DISTRIBUTING THE SOFTWARE, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

5. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

6. This License Agreement shall be governed by and interpreted in all respects by the law of the State of California, excluding conflict of law provisions. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between BeOpen and Licensee. This License Agreement does not grant permission to use BeOpen trademarks or trade names in a trademark sense to endorse or promote products or services of Licensee, or any third party. As an exception, the "BeOpen Python" logos available at <http://www.pythonlabs.com/logos.html> may be used according to the permissions granted on that web page.

7.

By copying, installing or otherwise using the software, Licensee agrees to be bound by the terms and conditions of this License Agreement.

CNRI LICENSE AGREEMENT FOR PYTHON 1.6.1

1. This LICENSE AGREEMENT is between the Corporation for National Research Initiatives, having an office at 1895 Preston White Drive, Reston, VA 20191 ("CNRI"), and the Individual or Organization ("Licensee") accessing and otherwise using Python 1.6.1 software in source or binary form and its associated documentation.

2. Subject to the terms and conditions of this License Agreement, CNRI hereby grants Licensee a nonexclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use Python 1.6.1 alone or in any derivative version, provided, however, that CNRI's License Agreement and CNRI's notice of copyright, i.e., "Copyright (c) 1995-2001 Corporation for National Research Initiatives;

All Rights

Reserved" are retained in Python 1.6.1 alone or in any derivative version prepared by Licensee. Alternately, in lieu of CNRI's License Agreement, Licensee may substitute the following text (omitting the quotes): "Python 1.6.1 is made available subject to the terms and conditions in CNRI's License Agreement. This Agreement together with Python 1.6.1 may be located on the Internet using the following

unique, persistent identifier (known as a handle): 1895.22/1013. This Agreement may also be obtained from a proxy server on the Internet using the following URL: <http://hdl.handle.net/1895.22/1013>".

3. In the event Licensee prepares a derivative work that is based on or incorporates Python 1.6.1 or any part thereof, and wants to make the derivative work available to others as provided herein, then Licensee hereby agrees to include in any such work a brief summary of the changes made to Python 1.6.1.

4. CNRI is making Python 1.6.1 available to Licensee on an "AS IS" basis.

CNRI MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, CNRI MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF PYTHON 1.6.1 WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

5. CNRI SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF PYTHON 1.6.1 FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF MODIFYING, DISTRIBUTING, OR OTHERWISE USING PYTHON 1.6.1, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

6. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

7. This License Agreement shall be governed by the federal intellectual property law of the United States, including without limitation the federal copyright law, and, to the extent such U.S. federal law does not apply, by the law of the Commonwealth of Virginia, excluding Virginia's conflict of law provisions.

Notwithstanding

the foregoing, with regard to derivative works based on Python 1.6.1 that incorporate non-separable material that was previously distributed under the GNU General Public License (GPL), the law of the Commonwealth of Virginia shall govern this License Agreement only as to issues arising under or with respect to Paragraphs 4, 5, and 7 of this License Agreement. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between CNRI and Licensee. This License Agreement does not grant permission to use CNRI trademarks or trade name in a trademark sense to endorse or promote products or services of Licensee, or any third party.

8. By clicking on the "ACCEPT" button where indicated, or by copying, installing or otherwise using Python 1.6.1, Licensee agrees to be bound by the terms and conditions of this License Agreement.

ACCEPT

CWI LICENSE AGREEMENT FOR PYTHON 0.9.0 THROUGH 1.2

Copyright

(c) 1991 - 1995, Stichting Mathematisch Centrum Amsterdam,
The Netherlands. All rights reserved.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Stichting Mathematisch Centrum or CWI not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

STICHTING MATHEMATISCH CENTRUM DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL STICHTING MATHEMATISCH CENTRUM BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

1.58 pygpgme 0.1

1.58.1 Available under license :

Found license 'GNU Lesser General Public License' in 'License: LGPL Classifier: License :: OSI Approved :: GNU Library or Lesser General Public License (LGPL)'

Found license 'GNU Lesser General Public License' in '"License :: OSI Approved :: GNU Library or Lesser General Public License (LGPL)';'

Found license 'GNU Lesser General Public License' in '"This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version. This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details. You should have received a copy of the GNU Lesser General Public'

Found license 'GNU Lesser General Public License' in '# This library is free software; you can redistribute it and/or # modify it under the terms of the GNU Lesser General Public # License as published by the Free Software Foundation; either # version 2.1 of the License, or (at your option) any later version. # This library is distributed in the hope that it will be useful, # but WITHOUT ANY WARRANTY; without even the implied warranty of # MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU # Lesser General Public License for more details. # You should have received a copy of the GNU Lesser General Public'

1.59 python-urlgrabber 3.9.1

1.59.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients

all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain

special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is

included without
limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that,

in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of

the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed

under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables

containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these

materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing

the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the

original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

1.60 yum-metadata-parser 1.1.2

1.60.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that

you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's

source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest

your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not

compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's
name and a brief idea of what it does.>
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by
the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
```

GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.61 pycairo 1.20.0

1.61.1 Available under license :

PyCairo is free software.

Every source file in the implementation of PyCairo is available to be redistributed and/or modified under the terms of either the GNU Lesser General Public License (LGPL) version 2.1 or the Mozilla Public License (MPL) version 1.1. Some files are available under more

liberal terms, but we believe that in all cases, each file may be used under either the LGPL or the MPL.

See the following files in this directory for the precise terms and conditions of either license:

COPYING-LGPL-2.1
COPYING-MPL-1.1

Please see each file in the implementation for Copyright and licensing information.

SPDX-License-Identifier: LGPL-2.1-only OR MPL-1.1

1.62 procps 3.3.10

1.62.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price.

Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights.

These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program).

Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the

entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as

distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE,
THERE IS NO WARRANTY
FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN
OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES
PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED
OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF
MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS
TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE
PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING,
REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING
WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR
REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES,
INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING
OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED
TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY
YOU OR
THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER
PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE
POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest
possible use to the public, the best way to achieve this is to make it
free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest
to attach them to the start of each source file to most effectively
convey the exclusion of warranty; and each file should have at least
the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify
it under the terms of the GNU

General Public License as published by

the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute
it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When

we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect

transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library

with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file

that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at

least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your

rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that

system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR

PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer)
or your
school, if any, to sign a "copyright disclaimer" for the library, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the
library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.63 tdb 1.41.12

1.63.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<https://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for
software and other kinds of works.

The licenses for most software and other practical works are designed
to take away your freedom to share and change the works. By contrast,
the GNU General Public License is intended to guarantee your freedom to
share and change all versions of a program--to make sure it remains free
software for all its users. We, the Free Software Foundation, use the
GNU General Public License for most of our software; it applies also to
any other work released this way by its authors. You can apply it to
your programs, too.

When we speak of free software, we are referring to
freedom, not
price. Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
them if you wish), that you receive source code or can get it if you
want it, that you can change the software or use pieces of it in new
free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of

interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not

convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to

produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years

and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular

product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the

entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains

a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work

occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant

patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory

patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the

GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <https://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <https://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <https://www.gnu.org/licenses/why-not-lgpl.html>.

1.64 multipath-tools 0.8.3-1

1.64.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <https://fsf.org/>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same

freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees"

and

"recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that

Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of

your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section

7. This requirement modifies the requirement in section 4 to

"keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical

medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option

remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating

where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting

any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <https://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <https://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <https://www.gnu.org/licenses/why-not-lgpl.html>.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price.

Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so

that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections

1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and

all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the

original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR

THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU  
General Public License as published by  
the Free Software Foundation; either version 2 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License along  
with this program; if not, write to the Free Software Foundation, Inc.,  
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.
```

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute  
it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may

be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this

is what you want to do, use the GNU Lesser General Public License instead of this License.

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that

you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a

combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or

other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License").

Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the

ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The

threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute

the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany

the work with the complete corresponding

machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate

properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the

integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.65 open-iscsi 2.1.6

1.65.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price.

Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for

this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work

are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary

form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then

the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free

Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU

General Public License as published by
the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License along
with this program; if not, write to the Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute
it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than ``show w'` and ``show c'`; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this
is what you want to do, use the GNU Lesser General
Public License instead of this License.

1.66 libxext 1.3.3

1.66.1 Available under license :

Copyright 1986, 1987, 1988, 1989, 1994, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from The Open Group.

Copyright (c) 1996 Digital Equipment Corporation, Maynard, Massachusetts.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL DIGITAL EQUIPMENT CORPORATION BE LIABLE FOR ANY CLAIM, DAMAGES, INCLUDING, BUT NOT LIMITED TO CONSEQUENTIAL OR INCIDENTAL DAMAGES, OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of Digital Equipment Corporation

shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from Digital Equipment Corporation.

Copyright (c) 1997 by Silicon Graphics Computer Systems, Inc.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Silicon Graphics not be used in advertising or publicity pertaining to distribution of the software without specific prior written permission.

Silicon

Graphics makes no representation about the suitability of this software for any purpose. It is provided "as is" without any express or implied warranty.

SILICON GRAPHICS DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL SILICON GRAPHICS BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1992 Network Computing Devices

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of NCD. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. NCD. makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

NCD. DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL NCD. BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1991,1993 by Digital Equipment Corporation, Maynard, Massachusetts, and Olivetti Research Limited, Cambridge, England.

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of Digital or Olivetti not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

DIGITAL AND OLIVETTI DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL THEY BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1986, 1987, 1988 by Hewlett-Packard Corporation

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Hewlett-Packard not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

Hewlett-Packard makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

This software is not subject to any license of the American Telephone and Telegraph Company or of the Regents of the University of California.

Copyright (c) 1994, 1995 Hewlett-Packard Company

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software,

and to
permit persons to whom the Software is furnished to do so, subject to
the following conditions:

The above copyright notice and this permission notice shall be included
in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF
MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT.
IN NO EVENT SHALL HEWLETT-PACKARD COMPANY BE LIABLE FOR ANY CLAIM,
DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR
OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR
THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the Hewlett-Packard
Company shall not be used in advertising or otherwise to promote the
sale, use or other dealings in this Software without prior written
authorization from the Hewlett-Packard Company.

Copyright Digital Equipment Corporation, 1996

Permission

to use, copy, modify, distribute, and sell this
documentation for any purpose is hereby granted without fee,
provided that the above copyright notice and this permission
notice appear in all copies. Digital Equipment Corporation
makes no representations about the suitability for any purpose
of the information in this document. This documentation is
provided ``as is" without express or implied warranty.

Copyright (c) 1999, 2005, 2006, 2013, Oracle and/or its affiliates.
All rights reserved.

Permission is hereby granted, free of charge, to any person obtaining a
copy of this software and associated documentation files (the "Software"),
to deal in the Software without restriction, including without limitation
the rights to use, copy, modify, merge, publish, distribute, sublicense,
and/or sell copies of the Software, and to permit persons to whom the
Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice (including the
next
paragraph) shall be included in all copies or substantial portions of the
Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,

FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright (c) 1989 X Consortium, Inc. and Digital Equipment Corporation.

Copyright (c) 1992 X Consortium, Inc. and Intergraph Corporation.

Copyright (c) 1993 X Consortium, Inc. and Silicon Graphics, Inc.

Copyright (c) 1994, 1995 X Consortium, Inc. and Hewlett-Packard Company.

Permission to use, copy, modify, and distribute this documentation for any purpose and without fee is hereby granted, provided that the above copyright notice and this

permission notice appear in all copies.

Digital Equipment Corporation, Intergraph Corporation, Silicon Graphics, Hewlett-Packard, and the X Consortium make no representations about the suitability for any purpose of the information in this document. This documentation is provided ``as is" without express or implied warranty.

1.67 pycryptsetup 0.0.11

1.67.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed

to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it,

either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to

control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.68 scdate 1.9.60

1.68.1 Available under license :

MIT

The MIT License (MIT)

Copyright (c) 2017 Thomas Grainger

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF

OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Portions of this sc-date-time (ES2015+) Software may utilize the following copyrighted material, the use of which is hereby acknowledged.

sc-date-time: <https://github.com/SimeonC/sc-date-time/tree/383fe9db346c6f8a880d6b2cec9e2b9a4cbd46fa>

The MIT License (MIT)

Copyright (c) 2015 Simeon Cheeseman

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.69 python-meh 0.11

1.69.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that

you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim

copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest

your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy

the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any

patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE

LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License

along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.70 firstboot 1.110

1.70.1 Available under license :

No license file was found, but licenses were detected in source scan.

```
# This file is distributed under the same license as the PACKAGE package.
#~ "under the GNU General Public License version 2. There are no "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/en_GB.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
```

OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/mai.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/kn.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ne.po
*
/opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/bg.po
No license file was found, but licenses were detected in source scan.

This file is distributed under the same license as the PACKAGE package.
#~ "under the GNU General Public License version 2. There are no "
#~ "disponibil sub licena GNU General Public License (Licen Public "

Found in path(s):
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ro.po
No license file was found, but licenses were detected in source scan.

#~ "under the GNU General Public License version 2. There are no "
#~ "Kompilasi dibuat berdasarkan GNU General Public License versi 2. Tidak "

Found in path(s):
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/id.po
No license file was found, but licenses were detected in source scan.

License: GPLv2+

Found in path(s):
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot.spec
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot.spec
No license file was found, but licenses were detected in source scan.

#~ "under the GNU General Public License version 2. There are no "
#~ "licence van. A teljes rendszert a GNU General Public License (GPL) 2-es "

Found in path(s):
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/hu.po
No license file was found, but licenses were detected in source scan.

#~ "under the GNU General Public License version 2. There are no "
#~ "beschikbaar gemaakt onder de GNU General Public License version 2. Er "

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/nl.po

No license file was found, but licenses were detected in source scan.

This file is distributed under the same license as the pa package.

#~ "under the GNU General Public License version 2. There are no "

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/pa.po

No license file was found, but licenses were detected in source scan.

This file is distributed under the same license as the firstboot package.

#~ "under the GNU General Public License version 2. There are no "

#~ " GNU General Public License 2. "

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/uk.po

No license file was found, but licenses were detected in source scan.

This file is distributed under the same license as the firstboot package.

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/af.po

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/pt_BR.po

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/be.po

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/bn_IN.po

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/nso.po

*

/opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/am.po

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/de.po

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/bn.po

No license file was found, but licenses were detected in source scan.

This copyrighted material is made available to anyone wishing to use, modify,

copy, or redistribute it subject to the terms and conditions of the GNU

General Public License v.2. This program is distributed in the hope that it

implied warranties of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with
subject to the GNU General Public License and may only be used or replicated

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot/module.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/modules/welcome.py
*
/opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot/config.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot/interface.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot/loader.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot/constants.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/modules/eula.py
*
/opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/modules/create_user.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/progs/firstboot
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot/xfrontend.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/firstboot/moduleset.py
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/modules/date.py
No license file was found, but licenses were detected in source scan.
```

```
#~ "under the GNU General Public License version 2. There are no "
#~ "samkvæmt skilmálum GNU General Public License útgáfu 2. Það eru engar "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/is.po
No license file was found, but licenses were detected in source scan.
```

```
# This file is distributed under the same license as the firstboot package.
#~ "under the GNU General Public License version 2. There are no "
#~ "General Public License versio 2:n alaisena. Tämän koodin käyttöä, "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/fi.po
```

No license file was found, but licenses were detected in source scan.

```
# This file is distributed under the same license as the firstboot package.
#~ "under the GNU General Public License version 2. There are no "
#~ "General Public License version 2. Der er ingen begrænsninger på brug, "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/da.po
No license file was found, but licenses were detected in source scan.
```

```
# This file is distributed under the same license as the mk package.
#~ "under the GNU General Public License version 2. There are no "
#~ "GNU General Public License 2.      "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/mk.po
No license file was found, but licenses were detected in source scan.
```

```
# This file is distributed under the same license as the PACKAGE package.
#~ "under the GNU General Public License version 2. There are no "
#~ "  GNU General Public License  " "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/as.po
No license file was found, but licenses were detected in source scan.
```

```
#~ "under the GNU General Public License version 2. There are no "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ta.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ast.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/pt.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/sl.po
No license file was found, but licenses were detected in source scan.
```

```
#~ "under the GNU General Public License version 2. There are no "
#~ ".  GNU General Public 2.  , "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/he.po
```


No license file was found, but licenses were detected in source scan.

```
# This file is distributed under the same license as the firstboot package.  
#~ "under the GNU General Public License version 2. There are no "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/sr.po  
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/sr@latin.po  
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ca.po
```

No license file was found, but licenses were detected in source scan.

```
# This file is distributed under the same license as the firstboot package.  
#~ "under the GNU General Public License version 2. There are no "  
#~ "svojou vlastnou licenciou. Zostava je k dispozícii pod GNU General "  
#~ "Public License verzie 2. Neexistujú žiadne obmedzenia na používanie, "
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/sk.po
```

No license file was found, but licenses were detected in source scan.

"Thank you for installing Fedora. Fedora is a compilation of software packages, each under its own license. The compilation is made available under the GNU General Public License version 2. There are no restrictions on using, copying, or modifying this code. However, there are restrictions and obligations that apply to the redistribution of the code, either in its original or a modified form. Among other things, those restrictions/obligations pertain to the licensing of the redistribution, trademark rights, and export control.\n"

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/fa.po
```

No license file was found, but licenses were detected in source scan.

```
# This file is distributed under the same license as the PACKAGE package.
```

Found in path(s):

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/or.po  
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/sq.po  
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/hy.po  
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/si.po  
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-  
0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ml.po
```

```

*
/opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/my.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/firstboot.pot
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/lv.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/zu.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/gu.po
*
/opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/gl.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/et.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/lo.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ar.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/mr.po
*
/opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ka.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/lt.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/te.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ku.po
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ur.po
No license file was found, but licenses were detected in source scan.

```

```
#~ "under the GNU General Public License version 2. There are no "
```

```
#~ " GNU General Public Licence version "
```

```
Found in path(s):
```

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/el.po
No license file was found, but licenses were detected in source scan.
```

```
#~ "under the GNU General Public License version 2. There are no "
```

```
#~ "berada dibawah Lesen GNU General Public versi 2. Tiada halangan untuk "
```

```
Found in path(s):
```

```
* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-
```

OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/ms.po

No license file was found, but licenses were detected in source scan.

#~ "under the GNU General Public License version 2. There are no "

#~ "balík s rznými licencemi. Sbírka je uvolnna pod GNU General Public "

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/cs.po

No license file was found, but licenses were detected in source scan.

#~ "under the GNU General Public License version 2. There are no "

#~ "\GNU General Public License\" verzije 2. Ne postoje ogranijenja po "

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/hr.po

No license file was found, but licenses were detected in source scan.

This file is distributed under the same license as the PACKAGE package.

#~ "under the GNU General Public License version 2. There are no "

#~ " GNU General Public License 2 "

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/th.po

No license file was found, but licenses were detected in source scan.

This program is free software; you can redistribute it and/or modify

it under the terms of the GNU General Public License as published by

the Free Software Foundation; either version 2 of the License, or

(at your option) any later version.

This program is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of

MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the

GNU General Public License for more details.

You should have received a copy of the GNU General Public License

along with this program; if not, write to the Free Software

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/modules/additional_cds.py

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-OgfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/modules/rootpassword.py

No license file was found, but licenses were detected in source scan.

This file is distributed under the same license as the rhgb package.

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/cy.po

No license file was found, but licenses were detected in source scan.

#~ "under the GNU General Public License version 2. There are no "

#~ "tilgjengelig under GNU General Public License versjon 2. Det finnes ingen "

Found in path(s):

* /opt/cola/permits/1300628744_1715759129.4753072/0/firstboot-1.110.10-1.el6.src.rpm-cosi-expand-archive-0gfhTLML/firstboot-1.110.10.tar.bz2-cosi-expand-archive-Gw3QcKtD/firstboot-1.110.10/po/nb.po

1.71 libogg 1.1.4-2.1.el6

1.71.1 Available under license :

Copyright (c) 2002, Xiph.org Foundation

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- Neither the name of the Xiph.org Foundation nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS ``AS IS'' AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS

BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.72 slip 0.2.20

1.72.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on

it,
under Section 2) in object code or executable form under the terms of
Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable
source code, which must be distributed under the terms of Sections
1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three
years, to give any third party, for a charge no more than your
cost of physically performing source distribution, a complete
machine-readable copy of the corresponding source code, to be
distributed under the terms of Sections 1 and 2 above on a medium
customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer
to distribute corresponding source code. (This alternative is
allowed only for noncommercial distribution and only if you
received the program in object code or executable
form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for
making modifications to it. For an executable work, complete source
code means all the source code for all modules it contains, plus any
associated interface definition files, plus the scripts used to
control compilation and installation of the executable. However, as a
special exception, the source code distributed need not include
anything that is normally distributed (in either source or binary
form) with the major components (compiler, kernel, and so on) of the
operating system on which the executable runs, unless that component
itself accompanies the executable.

If distribution of executable or object code is made by offering
access to copy from a designated place, then offering equivalent
access to copy the source code from the same place counts as
distribution of the source code, even though third parties are not
compelled to copy the source
along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program
except as expressly provided under this License. Any attempt
otherwise to copy, modify, sublicense or distribute the Program is
void, and will automatically terminate your rights under this License.
However, parties who have received copies, or rights, from you under
this License will not have their licenses terminated so long as such
parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING

WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
```

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.73 smartmontools 5.42

1.73.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below,

refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but

does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for

making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot

distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of

this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,

or

(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the

library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.74 pango 1.28.1

1.74.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them

with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to

permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from

such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the

source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply

a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the

Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this

License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the

"copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

Permission is hereby granted, without written agreement and without license or royalty fees, to use, copy, modify, and distribute this software and its documentation for any purpose, provided that the above copyright notice and the following two paragraphs appear in all copies of this software.

IN NO EVENT SHALL THE COPYRIGHT HOLDER BE LIABLE TO ANY PARTY FOR DIRECT, INDIRECT, SPECIAL, INCIDENTAL, OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OF THIS SOFTWARE AND ITS DOCUMENTATION, EVEN IF THE COPYRIGHT HOLDER HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

THE COPYRIGHT HOLDER SPECIFICALLY DISCLAIMS ANY WARRANTIES, INCLUDING,

BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE SOFTWARE PROVIDED HEREUNDER IS ON AN "AS IS" BASIS, AND THE COPYRIGHT HOLDER HAS NO OBLIGATION TO PROVIDE MAINTENANCE, SUPPORT, UPDATES, ENHANCEMENTS, OR MODIFICATIONS.

1.75 mdadm 3.2.3

1.75.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price.

Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License

along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of

a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under

this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to

decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING,

REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute
it
under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.76 talloc 2.0.1

1.76.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<https://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to

share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the

extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and

appropriately

publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any
non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all
recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey,
and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to
produce it from the Program, in the form of source code under the
terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified
it, and giving a relevant date.

- b) The work must carry prominent notices stating that it is
released under this License and any conditions added under section
7. This requirement modifies the requirement in section
4 to
"keep intact all notices".

- c) You must license the entire work, as a whole, under this
License to anyone who comes into possession of a copy. This
License will therefore apply, along with any applicable section 7
additional terms, to the whole of the work, and all its parts,
regardless of how they are packaged. This License gives no
permission to license the work in any other way, but it does not
invalidate such permission if you have separately received it.

- d) If the work has interactive user interfaces, each must display
Appropriate Legal Notices; however, if the Program has interactive
interfaces that do not display Appropriate Legal Notices, your
work need not make them do so.

A compilation of a covered work with other separate and independent
works, which are not by their nature extensions of the covered work,
and which are not combined with it such as to form a larger program,
in or on a volume of a storage or distribution
medium, is called an
"aggregate" if the compilation and its resulting copyright are not
used to limit the access or legal rights of the compilation's users
beyond what the individual works permit. Inclusion of a covered work
in an aggregate does not cause this License to apply to the other
parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.
- e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding

Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and

protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright

holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered

work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF

SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software: you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation, either version 3 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program. If not, see <https://www.gnu.org/licenses/>.
```

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary.

For more information on this, and how to apply and follow the GNU GPL, see <<https://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<https://www.gnu.org/licenses/why-not-lgpl.html>>.

1.77 biosdevname 0.6.2-1.el7

1.77.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed

to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it,

either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to

control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.78 gtk 2.18.9

1.78.1 Available under license :

This work may be reproduced and distributed in whole or in part, in any medium, physical or electronic, so as long as this copyright notice remains intact and unchanged on all copies. Commercial redistribution is permitted and encouraged, but you may not redistribute, in whole or in part, under terms more restrictive than those under which you received it. If you redistribute a modified or translated version of this work, you must also make the source code to the modified or translated version available in electronic form without charge. However, mere aggregation as part of a larger work shall not count as a modification for this purpose.

All code examples in this work are placed into the public domain, and may be used, modified and redistributed without restriction.

BECAUSE THIS WORK IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE WORK, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE WORK "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. SHOULD THE WORK PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY REPAIR OR CORRECTION.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE WORK AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE WORK, EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this,

we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion

of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of

a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a

derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany

the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or

distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that

system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR

PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year>  
<name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330,

Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of

it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits

its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices

stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2,

instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline

functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables

containing that work also fall under Section 6,

whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user

installs one, as long as the modified version is

interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or

distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed

through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time.

Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of

all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR

PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also

get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.79 cryptsetup 1.4.5

1.79.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,

not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using

a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other

program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1

above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary

GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be

linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the

object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany

the work with the complete corresponding

machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2)

will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining

where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any

such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO

WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey

the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU

Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price.

Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program

is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based

on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering

access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to

apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of

MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute
it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

In addition, as a special exception, the copyright holders give permission to link the code of portions of this program with the OpenSSL library under certain conditions as described in each individual source file, and distribute linked combinations including the two.

You must obey the GNU General Public License in all respects

for all of the code used other than OpenSSL. If you modify file(s) with this exception, you may extend this exception to your version of the file(s), but you are not obligated to do so. If you do not wish to do so, delete this exception statement from your version. If you delete this exception statement from all source files in the program, then also delete it here.

1.80 zenity 2.28.0-1.el6

1.80.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis

or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this

function must

be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a

medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not

excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute

the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a

license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is

safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

1.81 libuser 0.56.13-5.el6

1.81.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies

of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on

the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute

such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to

exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5.

A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the

library". The executable is therefore covered by this License.
Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood

that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it.

However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the

integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR

OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License

for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library 'Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.82 vim 7.2.411-1.8.el6

1.82.1 Available under license :

```
" netrw.vim: Handles file transfer and remote directory listing across
"     AUTOLOAD SECTION
" Date: Oct 23, 2008
" Version: 134
" Maintainer: Charles E Campbell, Jr <NdrOchip@ScampbellPfamily.AbizM-NOSPAM>
" GetLatestVimScripts: 1075 1 :AutoInstall: netrw.vim
" Copyright: Copyright (C) 1999-2008 Charles E. Campbell, Jr. {{{1
"     Permission is hereby granted to use and distribute this code,
"     with or without modifications, provided that this copyright
"     notice is copied with it. Like anything else that's free,
"     netrw.vim, netrwPlugin.vim, and netrwSettings.vim are provided
"     *as is* and come with no warranty of any kind, either
"     expressed or implied. By using this plugin, you agree that
"     in no event will the copyright holder be liable for any damages
"     resulting from the use of this software.
"redraw!|call DechoSep()|call inputsave()|call input("Press
<cr> to continue")|call inputrestore()
"
" But be doers of the Word, and not only hearers, deluding your own selves {{{1
" (James 1:22 RSV)
" -----
" Load Once: {{{1
if &cp || exists("g:loaded_netrw")
```

```

finish
endif
let g:loaded_netrw = "v134"
if v:version < 702
echohl WarningMsg
echo "***warning*** this version of netrw needs vim 7.2"
echohl Normal
finish
endif
if !exists("s:NOTE")
let s:NOTE = 0
let s:WARNING = 1
let s:ERROR = 2
endif

" sanity checks
if v:version < 700
call netrw#ErrorMsg(s:WARNING,"you need vim version 7.0 or later for version ".g:loaded_netrw." of netrw",1)
finish
endif

let s:keepcpo= &cpo
setlocal cpo&vim
"DechoTabOn
"call Decho("doing autoload/netrw.vim version ".g:loaded_netrw)

" =====
" Netrw Variables: {{{1
" =====

" -----
" Netrw Constants:
{{{2
if !exists("g:netrw_dirhist_cnt")
let g:netrw_dirhist_cnt= 0
endif
if !exists("s:LONGLIST")
let s:THINLIST = 0
let s:LONGLIST = 1
let s:WIDELIST = 2
let s:TREELIST = 3
let s:MAXLIST = 4
endif

" -----
" Default values for netrw's global protocol variables {{{2
if !exists("g:netrw_dav_cmd")
if executable("cadaver")

```

```

let g:netrw_dav_cmd = "cadaver"
elseif executable("curl")
let g:netrw_dav_cmd = "curl"
else
let g:netrw_dav_cmd = ""
endif
endif
if !exists("g:netrw_fetch_cmd")
if executable("fetch")
let g:netrw_fetch_cmd = "fetch -o"
else
let g:netrw_fetch_cmd = ""
endif
endif
if !exists("g:netrw_ftp_cmd")
let g:netrw_ftp_cmd = "ftp"
endif
if !exists("g:netrw_http_cmd")
if executable("elinks")
let g:netrw_http_cmd = "elinks"
if !exists("g:netrw_http_xcmd")
let g:netrw_http_xcmd= "-dump >"
endif
elseif executable("links")
let g:netrw_http_cmd
= "links"
if !exists("g:netrw_http_xcmd")
let g:netrw_http_xcmd= "-dump >"
endif
elseif executable("curl")
let g:netrw_http_cmd = "curl"
if !exists("g:netrw_http_xcmd")
let g:netrw_http_xcmd= "-o"
endif
elseif executable("wget")
let g:netrw_http_cmd = "wget"
if !exists("g:netrw_http_xcmd")
let g:netrw_http_xcmd= "-q -O"
endif
elseif executable("fetch")
let g:netrw_http_cmd = "fetch"
if !exists("g:netrw_http_xcmd")
let g:netrw_http_xcmd= "-o"
endif
else
let g:netrw_http_cmd = ""
endif
endif

```

```

if !exists("g:netrw_rcp_cmd")
  let g:netrw_rcp_cmd = "rcp"
endif
if !exists("g:netrw_rsync_cmd")
  let g:netrw_rsync_cmd = "rsync"
endif
if !exists("g:netrw_scp_cmd")
  let g:netrw_scp_cmd = "scp -q"
endif
if !exists("g:netrw_sftp_cmd")
  let g:netrw_sftp_cmd = "sftp"
endif
if !exists("g:netrw_ssh_cmd")
  let g:netrw_ssh_cmd = "ssh"
endif

if (has("win32") || has("win95") || has("win64") || has("win16"))
  \ && exists("g:netrw_use_nt_rcp")
  \ && g:netrw_use_nt_rcp
  \ && executable( $SystemRoot .'/system32/rcp.exe')
let s:netrw_has_nt_rcp = 1
let s:netrw_rcpmode = '-b'
else
let s:netrw_has_nt_rcp = 0
let s:netrw_rcpmode = ""
endif

" -----
" Default values for netrw's global variables {{{2
" Cygwin Detection ----- {{{3
if !exists("g:netrw_cygwin")
if has("win32") || has("win95") || has("win64") || has("win16")
if &shell =~ \%(\<bash>|\<zsh>)\%(\.exe)\=$'
  let g:netrw_cygwin= 1
else
  let g:netrw_cygwin= 0
endif
else
let g:netrw_cygwin= 0
endif
endif
endif
" Default values - a-c ----- {{{3
if !exists("g:netrw_alto")
let g:netrw_alto= &sb
endif
if !exists("g:netrw_altv")
let g:netrw_altv= &spr
endif

```

```

if !exists("g:netrw_browse_split")
let g:netrw_browse_split= 0
endif
if !exists("g:netrw_chgwin")
let g:netrw_chgwin = -1
endif
if !exists("g:netrw_compress")
let
  g:netrw_compress= "gzip"
endif
if !exists("g:netrw_ctags")
let g:netrw_ctags= "ctags"
endif
if !exists("g:netrw_cursorline")
let g:netrw_cursorline= 1
let s:netrw_usercul = &cursorline
let s:netrw_usercuc = &cursorcolumn
endif
" Default values - d-g ----- {{{3
if !exists("g:netrw_dirhist_cnt")
let g:netrw_dirhist_cnt= 0
endif
if !exists("g:netrw_decompress")
let g:netrw_decompress= { ".gz" : "gunzip" , ".bz2" : "bunzip2" , ".zip" : "unzip" , ".tar" : "tar -xf" }
endif
if !exists("g:netrw_dirhistmax")
let g:netrw_dirhistmax= 10
endif
if !exists("g:netrw_fastbrowse")
let g:netrw_fastbrowse= 1
endif
if !exists("g:netrw_ftp_browse_reject")
let g:netrw_ftp_browse_reject='^total\s\+\d\+\$|^Trying\s\+\d\+.*$\|^KERBEROS_V\d rejected|^Security
extensions not\|No such file\|: connect to address [0-9a-fA-F:]*: No route to host$'
endif
if !exists("g:netrw_ftp_list_cmd")
if has("unix") || (exists("g:netrw_cygwin") && g:netrw_cygwin)
let g:netrw_ftp_list_cmd
  = "ls -lF"
let g:netrw_ftp_timelist_cmd = "ls -tlF"
let g:netrw_ftp_sizelist_cmd = "ls -slF"
else
let g:netrw_ftp_list_cmd = "dir"
let g:netrw_ftp_timelist_cmd = "dir"
let g:netrw_ftp_sizelist_cmd = "dir"
endif
endif
endif
if !exists("g:netrw_ftpmode")

```

```

let g:netrw_ftpmode= "binary"
endif
" Default values - h-lh ----- {{{3
if !exists("g:netrw_hide")
let g:netrw_hide= 1
endif
if !exists("g:netrw_ignorenetc")
if &shell =~ "\c\<\%(cmd\|4nt)\.exe$"
let g:netrw_ignorenetc= 1
else
let g:netrw_ignorenetc= 0
endif
endif
if !exists("g:netrw_keepdir")
let g:netrw_keepdir= 1
endif
if !exists("g:netrw_list_cmd")
if g:netrw_scp_cmd =~ '^pscp' && executable("pscp")
" provide a 'pscp' listing command
if (has("win32") || has("win95") || has("win64") || has("win16")) && filereadable("c:\\private.ppk")
let g:netrw_scp_cmd = "pscp -i C:\\private.ppk"
endif
let g:netrw_list_cmd= g:netrw_scp_cmd." -ls USEPORT HOSTNAME:"
elseif
executable(g:netrw_ssh_cmd)
" provide a default listing command
let g:netrw_list_cmd= g:netrw_ssh_cmd." USEPORT HOSTNAME ls -FLa"
else
" call Decho(g:netrw_ssh_cmd." is not executable")
let g:netrw_list_cmd= ""
endif
endif
if !exists("g:netrw_list_hide")
let g:netrw_list_hide= ""
endif
" Default values - lh-lz ----- {{{3
if !exists("g:netrw_localcopycmd")
if has("win32") || has("win95") || has("win64") || has("win16")
if g:netrw_cygwin
let g:netrw_localcopycmd= "cp"
else
let g:netrw_localcopycmd= "copy"
endif
elseif has("unix") || has("macunix")
let g:netrw_localcopycmd= "cp"
else
let g:netrw_localcopycmd= ""
endif
endif

```



```

endif
if !exists("g:netrw_local_mkdir")
let g:netrw_local_mkdir= "mkdir"
endif
if !exists("g:netrw_localmovecmd")
if has("win32") || has("win95") || has("win64") || has("win16")
if g:netrw_cygwin
let g:netrw_localmovecmd= "mv"
else
let g:netrw_localmovecmd= "move"
endif
elseif has("unix")
|| has("macunix")
let g:netrw_localmovecmd= "mv"
else
let g:netrw_localmovecmd= ""
endif
endif
if !exists("g:netrw_local_rmdir")
let g:netrw_local_rmdir= "rmdir"
endif
if !exists("g:netrw_liststyle")
let g:netrw_liststyle= s:THINLIST
endif
if g:netrw_liststyle < 0 || g:netrw_liststyle >= s:MAXLIST
" sanity check
let g:netrw_liststyle= s:THINLIST
endif
if g:netrw_liststyle == s:LONGLIST && g:netrw_scp_cmd !~ '^pscp'
let g:netrw_list_cmd= g:netrw_list_cmd." -l"
endif
" Default values - m-r ----- {{{3
if !exists("g:netrw_markfileesc")
let g:netrw_markfileesc= '*./[\~'
endif
if !exists("g:netrw_maxfilenamelen")
let g:netrw_maxfilenamelen= 32
endif
if !exists("g:netrw_menu")
let g:netrw_menu= 1
endif
if !exists("g:netrw_mkdir_cmd")
let g:netrw_mkdir_cmd= g:netrw_ssh_cmd." USEPORT HOSTNAME mkdir"
endif
if !exists("g:netrw_mousemaps")
if exists("&mouse") && &mouse =~ '[anh]'
let g:netrw_mousemaps= 1
else

```

```

let g:netrw_mousemaps= 0
endif
endif
if !exists("g:netrw_retmap")
let g:netrw_retmap= 0
endif
if !exists("g:netrw_preview")
let g:netrw_preview= 0
endif
if !exists("g:netrw_scpport")
let g:netrw_scpport= "-P"
endif
if !exists("g:netrw_sshport")
let g:netrw_sshport= "-p"
endif
if !exists("g:netrw_rename_cmd")
let g:netrw_rename_cmd= g:netrw_ssh_cmd." USEPORT HOSTNAME mv"
endif
if !exists("g:netrw_rm_cmd")
let g:netrw_rm_cmd = g:netrw_ssh_cmd." USEPORT HOSTNAME rm"
endif
if !exists("g:netrw_rmdir_cmd")
let g:netrw_rmdir_cmd = g:netrw_ssh_cmd." USEPORT HOSTNAME rmdir"
endif
if !exists("g:netrw_rmf_cmd")
let g:netrw_rmf_cmd = g:netrw_ssh_cmd." USEPORT HOSTNAME rm -f"
endif
" Default values - s ----- {{{3
" set up shell quoting character
if exists("g:netrw_silent") && g:netrw_silent != 0
let s:netrw_silentxfer= "silent "
else
let s:netrw_silentxfer= ""
endif
if !exists("g:netrw_sort_by")
" alternatives: date size
let g:netrw_sort_by= "name"
endif
if !exists("g:netrw_sort_options")
let g:netrw_sort_options= ""
endif
if !exists("g:netrw_sort_direction")
" alternative: reverse (z y x ...)
let g:netrw_sort_direction= "normal"
endif
if !exists("g:netrw_sort_sequence")
let g:netrw_sort_sequence= '[V]$,\.h$,\.c$,\.cpp$,*,\.o$,\.obj$,\.info$,\.swp$,\.bak$,\~$'
endif

```

```

if !exists("g:netrw_special_syntax")
let g:netrw_special_syntax= 0
endif
if !exists("g:netrw_ssh_browser_reject")
let g:netrw_ssh_browser_reject='^total\s\+\d\+$'
endif
if !has("patch192")
if !exists("g:netrw_use_noswf")
let g:netrw_use_noswf= 1
endif
else
let g:netrw_use_noswf= 0
endif
" Default values - t-w ----- {{{3
if !exists("g:netrw_timefmt")
let g:netrw_timefmt= "%c"
endif
if !exists("g:netrw_xstrlen")
let g:netrw_xstrlen= 1
endif
if !exists("g:NetrwTopLvlMenu")
let g:NetrwTopLvlMenu= "Netrw."
endif
if !exists("g:netrw_use_errorwindow")
let g:netrw_use_errorwindow= 1
endif
if !exists("g:netrw_win95ftp")
let g:netrw_win95ftp=
1
endif
if !exists("g:netrw_winsize")
let g:netrw_winsize= ""
endif
" -----
" Default values for netrw's script variables: {{{2
if !exists("g:netrw_fname_escape")
let g:netrw_fname_escape= '?&%'
endif
if !exists("g:netrw_glob_escape")
let g:netrw_glob_escape= '[]*?{~$'
endif
if !exists("g:netrw_tmpfile_escape")
let g:netrw_tmpfile_escape= '&';
endif
let s:netrw_map_escape = "<\n\r\\<C-V>\"

```

" BufEnter event ignored by decho when following variable is true

" Has a side effect that doau BufReadPost doesn't work, so

```

" files read by network transfer aren't appropriately highlighted.
"let g:decho_bufenter = 1 "Decho

" =====
" Netrw Utility Functions: {{{1
" =====

" -----
" s:NetrwOptionSave: save options and set to "standard" form {{{2
" 06/08/07 : removed
call to NetrwSafeOptions(), either placed
"     immediately after NetrwOptionSave() calls in NetRead
"     and NetWrite, or after the s:NetrwEnew() call in
"     NetrwBrowse.
"     vt: normally its "w:" or "s:" (a variable type)
fun! s:NetrwOptionSave(vt)
" call Dfunc("s:NetrwOptionSave(vt<"a:vt.>" win#" .winnr()." buf#" .bufnr("%").<" .bufname(bufnr("%")).>")

" call Decho(a:vt."netrw_optionsave".(exists("{a:vt}netrw_optionsave")? ("=" .{a:vt}netrw_optionsave) : " doesn't
exist"))
if !exists("{a:vt}netrw_optionsave")
let {a:vt}netrw_optionsave= 1
else
" call Dret("s:NetrwOptionSave : options already saved")
return
endif
" call Decho("fo=" .&fo.(exists("&acd")? " acd=" .&acd : " acd doesn't exist"))

" Save current settings and current directory
let s:yykeep = @@
if exists("&l:acd")
let {a:vt}netrw_acdkeep = &l:acd
endif
let {a:vt}netrw_aikeep = &l:ai
let {a:vt}netrw_awkkeep = &l:aw
let {a:vt}netrw_cikeep = &l:ci
let {a:vt}netrw_cinkeep = &l:cin
let {a:vt}netrw_cinokeep = &l:cino
let {a:vt}netrw_comkeep = &l:com
let {a:vt}netrw_cpokeep = &l:cpo
if g:netrw_keeppdir
let {a:vt}netrw_dirkeep = getcwd()
endif
let {a:vt}netrw_fokeep = &l:fo " formatoptions
let {a:vt}netrw_gdkeep = &l:gd " gdefault
let {a:vt}netrw_hidkeep = &l:hidden
let {a:vt}netrw_magickeep = &l:magic
let {a:vt}netrw_repkeep = &l:report

```

```

let {a:vt}netrw_spellkeep = &l:spell
let {a:vt}netrw_twkeep = &l:tw " textwidth
let {a:vt}netrw_wigkeep = &l:wig " wildignore
if has("win32") && !has("win95")
  let {a:vt}netrw_swfkeep = &l:swf " swapfile
endif
if &go =~ 'a' | silent! let {a:vt}netrw_regstar = @* | endif
silent! let {a:vt}netrw_regslash= @/

" call Dret("s:NetrwOptionSave : win#".winnr()." buf#".bufnr("%"))
endfun

" -----
"
s:NetrwOptionRestore: restore options {{{2
fun! s:NetrwOptionRestore(vt)
" call Dfunc("s:NetrwOptionRestore(vt<".a:vt."> win#".winnr()." buf#".bufnr("%"))
if !exists("{a:vt}netrw_optionsave")
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:NetrwOptionRestore : ".a:vt."netrw_optionsave doesn't exist")
return
endif
unlet {a:vt}netrw_optionsave

if exists("&acd")
if exists("{a:vt}netrw_acdkeep")
" call Decho("g:netrw_keeppdir="g:netrw_keeppdir.": getcwd<".getcwd()."> acd=".&acd)
let curdir = getcwd()
let &l:acd = {a:vt}netrw_acdkeep
unlet {a:vt}netrw_acdkeep
if &l:acd
" call Decho("exe keepjumps lcd ".fnameescape(curdir)) " NOTE: was g:netrw_fname_escape for some reason
try
if !exists("&l:acd") && !&l:acd
exe 'keepjumps lcd '.fnameescape(curdir)
endif
catch /^Vim\%((\a\+))\=:E472/
call netrw#ErrorMsg(s:ERROR,"unable to change
directory to <".curdir."> (permissions?)",61)
endtry
endif
endif
endif

if exists("{a:vt}netrw_aikeep") |let &l:ai = {a:vt}netrw_aikeep |unlet {a:vt}netrw_aikeep |endif
if exists("{a:vt}netrw_awkeep") |let &l:aw = {a:vt}netrw_awkeep |unlet {a:vt}netrw_awkeep |endif
if exists("{a:vt}netrw_cikeep") |let &l:ci = {a:vt}netrw_cikeep |unlet {a:vt}netrw_cikeep |endif
if exists("{a:vt}netrw_cinkeep") |let &l:cin = {a:vt}netrw_cinkeep |unlet {a:vt}netrw_cinkeep |endif
if exists("{a:vt}netrw_cinokeep") |let &l:cino = {a:vt}netrw_cinokeep |unlet {a:vt}netrw_cinokeep |endif

```

```

if exists("{a:vt}netrw_comkeep") |let &l:com = {a:vt}netrw_comkeep |unlet {a:vt}netrw_comkeep |endif
if exists("{a:vt}netrw_cpokeep") |let &l:cpo = {a:vt}netrw_cpokeep |unlet {a:vt}netrw_cpokeep |endif
if exists("{a:vt}netrw_dirkeep") && isdirectory({a:vt}netrw_dirkeep) && g:netrw_keepdir
let dirkeep = substitute({a:vt}netrw_dirkeep, '\\','/', 'g')
if exists("{a:vt}netrw_dirkeep") |exe "keepjumps lcd ".fnameescape(dirkeep)|unlet {a:vt}netrw_dirkeep |endif
endif
if exists("{a:vt}netrw_fokeep") |let &l:fo = {a:vt}netrw_fokeep |unlet {a:vt}netrw_fokeep |endif
if exists("{a:vt}netrw_gdkeep") |let &l:gd = {a:vt}netrw_gdkeep |unlet {a:vt}netrw_gdkeep |endif
if exists("{a:vt}netrw_hidkeep") |let &l:hidden = {a:vt}netrw_hidkeep |unlet {a:vt}netrw_hidkeep |endif
if exists("{a:vt}netrw_magic") |let &l:magic = {a:vt}netrw_magic |unlet {a:vt}netrw_magic |endif
if exists("{a:vt}netrw_repkeep") |let &l:report = {a:vt}netrw_repkeep |unlet {a:vt}netrw_repkeep |endif
if exists("{a:vt}netrw_spellkeep")|let &l:spell = {a:vt}netrw_spellkeep |unlet {a:vt}netrw_spellkeep|endif
if exists("{a:vt}netrw_twkeep") |let &l:tw = {a:vt}netrw_twkeep |unlet {a:vt}netrw_twkeep |endif
if exists("{a:vt}netrw_wigkeep") |let &l:wig
= {a:vt}netrw_wigkeep |unlet {a:vt}netrw_wigkeep |endif
if exists("s:yykeep") |let @@ = s:yykeep |unlet s:yykeep |endif
if exists("{a:vt}netrw_swfkeep")
if &directory == ""
" user hasn't specified a swapfile directory;
" netrw will temporarily set the swapfile directory
" to the current directory as returned by getcwd().
let &l:directory = getcwd()
silent! let &l:swf = {a:vt}netrw_swfkeep
setlocal directory=
unlet {a:vt}netrw_swfkeep
elseif &l:swf != {a:vt}netrw_swfkeep
" following line causes a Press ENTER in windows -- can't seem to work around it!!!
silent! let &l:swf= {a:vt}netrw_swfkeep
unlet {a:vt}netrw_swfkeep
endif
endif
if exists("{a:vt}netrw_regstar") |silent! let @*= {a:vt}netrw_regstar |unlet {a:vt}netrw_regstar |endif
if exists("{a:vt}netrw_regslash")|silent! let @/= {a:vt}netrw_regslash|unlet {a:vt}netrw_regslash|endif

" call Decho("g:netrw_keepdir="g:netrw_keepdir.":
getcwd<"getcwd()."> acd=".&acd)
" call Decho("fo=".&fo.(exists("&acd")? " acd=".&acd : " acd doesn't exist"))
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:NetrwOptionRestore : win#"winnr()." buf#"bufnr("%"))
endfun

" -----
" s:NetrwSafeOptions: sets options to help netrw do its job {{{2
fun! s:NetrwSafeOptions()
" call Dfunc("s:NetrwSafeOptions() win#"winnr()." buf#"bufnr("%")."<"bufname(bufnr("%")).">")
" call Decho("window's ft=".&ft)
setlocal cino=
setlocal com=

```

```

setlocal cpo-=aA
if exists("&acd") | setlocal noacd | endif
setlocal nocin noai noci magic nospell nohid wig= noaw
setlocal fo=nroql2
setlocal tw=0
setlocal report=10000
setlocal isk+=@ isk+=* isk+=/
if g:netrw_use_noswf && has("win32") && !has("win95")
  setlocal noswf
endif
" call Decho("fo=".&fo.(exists("&acd")? "acd=".&acd
: "acd doesn't exist"))
" call Dret("s:NetrwSafeOptions")
endfun

" -----
" netrw#NetrwClean: remove netrw {{{2
" supports :NetrwClean -- remove netrw from first directory on runtimepath
"      :NetrwClean! -- remove netrw from all directories on runtimepath
fun! netrw#NetrwClean(sys)
" call Dfunc("netrw#NetrwClean(sys=".&a:sys.")")

if a:sys
  let choice= confirm("Remove personal and system copies of netrw?",&Yes\n&No")
else
  let choice= confirm("Remove personal copy of netrw?",&Yes\n&No")
endif
" call Decho("choice=".&choice)
let diddel= 0
let diddir= ""

if choice == 1
  for dir in split(&rtp,')
    if filereadable(dir."/plugin/netrwPlugin.vim")
"    call Decho("removing netrw-related files from ".&dir)
      if s:NetrwDelete(dir."/plugin/netrwPlugin.vim") |call netrw#ErrorMsg(1,"unable to remove
".&dir."/plugin/netrwPlugin.vim",55) |endif
      if s:NetrwDelete(dir."/autoload/netrwFileHandlers.vim")|call
netrw#ErrorMsg(1,"unable to remove ".&dir."/autoload/netrwFileHandlers.vim",55)|endif
      if s:NetrwDelete(dir."/autoload/netrwSettings.vim") |call netrw#ErrorMsg(1,"unable to remove
".&dir."/autoload/netrwSettings.vim",55) |endif
      if s:NetrwDelete(dir."/autoload/netrw.vim") |call netrw#ErrorMsg(1,"unable to remove
".&dir."/autoload/netrw.vim",55) |endif
      if s:NetrwDelete(dir."/syntax/netrw.vim") |call netrw#ErrorMsg(1,"unable to remove
".&dir."/syntax/netrw.vim",55) |endif
      if s:NetrwDelete(dir."/syntax/netrwlist.vim") |call netrw#ErrorMsg(1,"unable to remove
".&dir."/syntax/netrwlist.vim",55) |endif
      let diddir= dir
    endif
  endfor
endif

```

```

    let diddel= diddel + 1
    if !a:sys|break|endif
endif
endfor
endif

echohl WarningMsg
if diddel == 0
    echomsg "netrw is either not installed or not removable"
elseif diddel == 1
    echomsg "removed one
copy of netrw from <".diddir.">"
else
    echomsg "removed ".diddel." copies of netrw"
endif
echohl None

" call Dret("netrw#NetrwClean")
endfun

" -----
" Netrw Transfer Functions: {{{1
" =====

" -----
" netrw#NetRead: responsible for reading a file over the net {{{2
" mode: =0 read remote file and insert before current line
"       =1 read remote file and insert after current line
"       =2 replace with remote file
"       =3 obtain file, but leave in temporary format
fun! netrw#NetRead(mode,...)
" call Dfunc("netrw#NetRead(mode=".a:mode.",...) a:0=".a:0." ".g:loaded_netrw)

" save options {{{3
call s:NetrwOptionSave("w:")
call s:NetrwSafeOptions()

" interpret mode into a readcmd {{{3
if a:mode == 0 " read remote file before current line
    let readcmd = "0r"
elseif
a:mode == 1 " read file after current line
    let readcmd = "r"
elseif a:mode == 2 " replace with remote file
    let readcmd = "%r"
elseif a:mode == 3 " skip read of file (leave as temporary)
    let readcmd = "t"
else

```



```

exe a:mode
let readcmd = "r"
endif
let icoice = (a:0 == 0)? 0 : 1
" call Decho("readcmd<".readcmd."> icoice=".icoice)

" Get Temporary Filename {{{3
let tmpfile= s:GetTempfile("")
if tmpfile == ""
" call Dret("netrw#NetRead : unable to get a tempfile!")
return
endif

while icoice <= a:0

" attempt to repeat with previous host-file-etc
if exists("b:netrw_lastfile") && a:0 == 0
" call Decho("using b:netrw_lastfile<" . b:netrw_lastfile . ">")
let choice = b:netrw_lastfile
let icoice= icoice + 1

else
exe "let choice= a:" . icoice
" call Decho("no lastfile: choice<" . choice . ">")

if match(choice, "?") == 0
" give help
echomsg 'NetRead Usage:'
echomsg
':Nread machine:path          uses rcp'
echomsg ':Nread "machine path"      uses ftp  with <.netrc>'
echomsg ':Nread "machine id password path"  uses ftp'
echomsg ':Nread dav://machine[:port]/path    uses cadaver'
echomsg ':Nread fetch://machine/path        uses fetch'
echomsg ':Nread ftp://[user@]machine[:port]/path  uses ftp  autodetects <.netrc>'
echomsg ':Nread http://[user@]machine/path      uses http  wget'
echomsg ':Nread rcp://[user@]machine/path        uses rcp'
echomsg ':Nread rsync://machine[:port]/path    uses rsync'
echomsg ':Nread scp://[user@]machine[:#]port]/path  uses scp'
echomsg ':Nread sftp://[user@]machine[:#]port]/path  uses sftp'
sleep 4
break

elseif match(choice, '^') != -1
" Reconstruct Choice if choice starts with ""
" call Decho("reconstructing choice")
if match(choice, "$") != -1

```

```

" case ..."
let choice=strpart(choice,1,strlen(choice)-2)
else
  " case "... ... ..."
let choice = strpart(choice,1,strlen(choice)-1)
let wholechoice = ""

while match(choice,"$") == -1
  let wholechoice = wholechoice . " " . choice
  let icoice = icoice + 1
  if icoice > a:0
    if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,"Unbalanced string in filename ". wholechoice . """,3)
endif
" call Dret("netrw#NetRead :2 getcwd<".getcwd().">")
  return
  endif
  let choice= a:{icoice}
endwhile
let choice= strpart(wholechoice,1,strlen(wholechoice)-1) . " " . strpart(choice,0,strlen(choice)-1)
endif
endif
endif

" call Decho("choice<" . choice . ">")
let icoice= icoice + 1

" Determine method of read (ftp, rcp, etc) {{{3
call s:NetrwMethod(choice)
if !exists("b:netrw_method") || b:netrw_method < 0
" call Dfunc("netrw#NetRead
: unsupported method")
return
endif
let tmpfile= s:GetTempfile(b:netrw_fname) " apply correct suffix

" Check if NetrwBrowse() should be handling this request
" call Decho("checking if NetrwBrowse() should handle choice<".choice."> with
netrw_list_cmd<".g:netrw_list_cmd.">")
if choice =~ "^.*[\\/$]" && b:netrw_method != 5 && choice !~ '^http://'
" call Decho("yes, choice matches '^.*[\\/$]'")
keepjumps call s:NetrwBrowse(0,choice)
" call Dret("netrw#NetRead :3 getcwd<".getcwd().">")
return
endif

" =====
" Perform Protocol-Based Read {{{3

```

```

" =====
if exists("g:netrw_silent") && g:netrw_silent == 0 && &ch >= 1
  echo "(netrw) Processing your read request..."
endif

" .....
" rcp: NetRead Method #1 {{{3
if b:netrw_method == 1 " read with rcp
"   call Decho("read via rcp (method #1)")
" ER: nothing done with g:netrw_uid yet?

" ER: on Win2K" rcp machine[.user]:file tmpfile
" ER: if machine contains '.' adding .user is required (use $USERNAME)
" ER: the tmpfile is full path: rcp sees C:\... as host C
if s:netrw_has_nt_rcp == 1
if exists("g:netrw_uid") && ( g:netrw_uid != "" )
  let uid_machine = g:netrw_machine .'.' g:netrw_uid
else
  " Any way needed it machine contains a '.'
  let uid_machine = g:netrw_machine .'.' $USERNAME
endif
else
if exists("g:netrw_uid") && ( g:netrw_uid != "" )
  let uid_machine = g:netrw_uid .'@'. g:netrw_machine
else
  let uid_machine = g:netrw_machine
endif
endif
"   call Decho("executing: !" g:netrw_rcp_cmd." ".s:netrw_rcpmode."
".shellescape(uid_machine)." b:netrw_fname,1)." ".shellescape(tmpfile,1))
exe s:netrw_silentxfer."!" g:netrw_rcp_cmd." ".s:netrw_rcpmode."
".shellescape(uid_machine)." b:netrw_fname,1)." ".shellescape(tmpfile,1)
let result      = s:NetrwGetFile(readcmd, tmpfile, b:netrw_method)
let b:netrw_lastfile = choice

" .....
" ftp + <.netrc>: NetRead Method #2 {{{3
elseif b:netrw_method == 2 " read with ftp + <.netrc>
"   call Decho("read via ftp+.netrc (method #2)")
  let netrw_fname= b:netrw_fname
  call s:SaveBufVars()|new|call s:RestoreBufVars()
  let filtbuf= bufnr("%")
  setlocal ff=unix
  put =g:netrw_ftpmode
"   call Decho("filter input: ".getline(line("$")))
  if exists("g:netrw_ftpextracmd")
    put =g:netrw_ftpextracmd
"   call Decho("filter input: ".getline(line("$")))

```

```

endif
call setline(line("$")+1,'get ".netrw_fname."' .tmpfile)
" call Decho("filter input: ".getline(line("$")))
if exists("g:netrw_port") && g:netrw_port != ""
" call Decho("executing: %!" .g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine." " .g:netrw_port,1))
exe s:netrw_silentxfer."%!" .g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine." " .g:netrw_port,1)
else
" call Decho("executing: %!" .g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1))
exe s:netrw_silentxfer."%!" .g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)
endif
" If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
if getline(1) !~ "^$" && !exists("g:netrw_quiet") && getline(1) !~ '^Trying '
let debugkeep = &debug
setlocal debug=msg
call netrw#ErrorMsg(s:ERROR,getline(1),4)
let &debug = debugkeep
endif
call s:SaveBufVars()
bd!
if bufname("%") == "" && getline("$") == "" && line('$') == 1
" needed when one sources a file in a nolbl setting window via ftp
q!
endif
call s:RestoreBufVars()
let result = s:NetrwGetFile(readcmd, tmpfile, b:netrw_method)
let b:netrw_lastfile = choice

".....
" ftp + machine,id,passwd,filename: NetRead Method #3 {{{3
elseif b:netrw_method == 3 " read with ftp + machine, id, passwd, and fname
" Construct execution string (four lines) which will be passed through filter
" call Decho("read via ftp+mipf (method #3)")
let netrw_fname= escape(b:netrw_fname,g:netrw_fname_escape)
call s:SaveBufVars()|new|call s:RestoreBufVars()
let filtbuf= bufnr("%")
setlocal ff=unix
if exists("g:netrw_port") && g:netrw_port != ""
put ='open '.g:netrw_machine.' '.g:netrw_port
" call Decho("filter input: ".getline('.'))
else
put ='open '.g:netrw_machine
" call Decho("filter input: ".getline('.'))
endif

if exists("g:netrw_ftp") && g:netrw_ftp == 1
put =g:netrw_uid
" call Decho("filter input: ".getline('.'))
put =\".s:netrw_passwd.\""

```

```

" call Decho("filter input: ".getline('.'))
else
  put ='user \'".g:netrw_uid.'"\'".s:netrw_passwd.'"\'
" call Decho("filter input: ".getline('.'))
endif

if exists("g:netrw_ftpmode")
&& g:netrw_ftpmode != ""
  put =g:netrw_ftpmode
" call Decho("filter input: ".getline('.'))
endif
if exists("g:netrw_ftpextracmd")
  put =g:netrw_ftpextracmd
" call Decho("filter input: ".getline('.'))
endif
put ='get \'".netrw_fname.'" \'tmpfile
" call Decho("filter input: ".getline('.'))

" perform ftp:
" -i : turns off interactive prompting from ftp
" -n unix : DON'T use <.netrc>, even though it exists
" -n win32: quit being obnoxious about password
norm! 1Gdd
" call Decho("executing: %!"g:netrw_ftp_cmd." -i -n")
exe s:netrw_silentxfer."%!"g:netrw_ftp_cmd." -i -n"
" If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
if getline(1) !~ "^$"
" call Decho("error<".getline(1).">")
if !exists("g:netrw_quiet")
  call netrw#ErrorMsg(s:ERROR,getline(1),5)
endif
endif
call s:SaveBufVars()|bd!|call s:RestoreBufVars()
let result = s:NetrwGetFile(readcmd, tmpfile, b:netrw_method)
let b:netrw_lastfile = choice

".....
" scp: NetRead Method #4 {{{3
elseif b:netrw_method == 4 " read with scp
" call Decho("read via scp (method #4)")
if exists("g:netrw_port") && g:netrw_port != ""
  let useport= " ".g:netrw_scpport." ".g:netrw_port
else
  let useport= ""
endif
" call Decho("exe s:netrw_silentxfer.!"g:netrw_scp_cmd.useport."
".shellescape(g:netrw_machine.":"b:netrw_fname,1)." ".shellescape(tmpfile,1))
exe s:netrw_silentxfer."!"g:netrw_scp_cmd.useport." ".shellescape(g:netrw_machine.":"b:netrw_fname,1)."

```

```

".shellescape(tmpfile,1)
  let result      = s:NetrwGetFile(readcmd, tmpfile, b:netrw_method)
  let b:netrw_lastfile = choice

".....
" http: NetRead Method #5 (wget) {{{3
elseif  b:netrw_method == 5
"  call Decho("read via
http (method #5)")
  if g:netrw_http_cmd == ""
  if !exists("g:netrw_quiet")
    call netrw#ErrorMsg(s:ERROR,"neither the wget nor the fetch command is available",6)
  endif
"  call Dret("netrw#NetRead :4 getcwd<".getcwd().">")
  return
endif

if match(b:netrw_fname,"#") == -1 || exists("g:netrw_http_xcmd")
  " using g:netrw_http_cmd (usually elinks, links, curl, wget, or fetch)
"  call Decho('using '.g:netrw_http_cmd.' (# not in b:netrw_fname<'.b:netrw_fname.">')
  if exists("g:netrw_http_xcmd")
"    call Decho("exe ".s:netrw_silentxfer."!".g:netrw_http_cmd."
".shellescape("http://".g:netrw_machine.b:netrw_fname,1)." ".g:netrw_http_xcmd." ".shellescape(tmpfile,1))
    exe s:netrw_silentxfer."!".g:netrw_http_cmd." ".shellescape("http://".g:netrw_machine.b:netrw_fname,1)."
".g:netrw_http_xcmd." ".shellescape(tmpfile,1)
    else
"    call Decho("exe ".s:netrw_silentxfer."!".g:netrw_http_cmd." ".shellescape(tmpfile,1)."
".shellescape("http://".g:netrw_machine.b:netrw_fname,1))
    exe s:netrw_silentxfer."!".g:netrw_http_cmd." ".shellescape(tmpfile,1)."
".shellescape("http://".g:netrw_machine.b:netrw_fname,1)
  endif
  let result = s:NetrwGetFile(readcmd, tmpfile, b:netrw_method)

else
  " wget/curl/fetch plus a jump to an in-page marker (ie. http://abc/def.html#aMarker)
"  call Decho(("wget/curl plus jump (# in b:netrw_fname<".b:netrw_fname.">)")
  let netrw_html= substitute(b:netrw_fname,"#.*$", "", "")
  let netrw_tag = substitute(b:netrw_fname,"^.*#", "", "")
"  call Decho("netrw_html<".netrw_html.">")
"  call Decho("netrw_tag <".netrw_tag.">")
"  call Decho("exe ".s:netrw_silentxfer."!".g:netrw_http_cmd." ".shellescape(tmpfile,1)."
".shellescape("http://".g:netrw_machine.netrw_html,1))
  exe s:netrw_silentxfer."!".g:netrw_http_cmd." ".shellescape(tmpfile,1)."
".shellescape("http://".g:netrw_machine.netrw_html,1)
  let result = s:NetrwGetFile(readcmd, tmpfile,
b:netrw_method)
"  call Decho('<s*a\s*name=\s*""'.netrw_tag.'"/')
  exe 'norm! IG/<s*a\s*name=\s*""'.netrw_tag.'"/.'\<CR>'

```

```

endif
let b:netrw_lastfile = choice
setlocal ro

".....
" dav: NetRead Method #6 {{{3
elseif b:netrw_method == 6
" call Decho("read via cadaver (method #6)")

if !executable(g:netrw_dav_cmd)
call netrw#ErrorMsg(s:ERROR,g:netrw_dav_cmd." is not executable",73)
" call Dret("netrw#NetRead : ".g:netrw_dav_cmd." not executable")
return
endif
if g:netrw_dav_cmd =~ "curl"
" call Decho("exe ".s:netrw_silentxfer."!".g:netrw_dav_cmd."
".shellescape("dav://" .g:netrw_machine.b:netrw_fname,1)." ".shellescape(tmpfile,1))
exe s:netrw_silentxfer."!".g:netrw_dav_cmd." ".shellescape("dav://" .g:netrw_machine.b:netrw_fname,1)."
".shellescape(tmpfile,1)
else
" Construct execution string (four lines) which will be passed through filter
let netrw_fname=
escape(b:netrw_fname,g:netrw_fname_escape)
new
setlocal ff=unix
if exists("g:netrw_port") && g:netrw_port != ""
put ='open '.g:netrw_machine.' '.g:netrw_port
else
put ='open '.g:netrw_machine
endif
put ='user '.g:netrw_uid.' '.s:netrw_passwd
put ='get '.netrw_fname.' '.tmpfile
put ='quit'

" perform cadaver operation:
norm! lGdd
" call Decho("executing: %!" .g:netrw_dav_cmd)
exe s:netrw_silentxfer."%!" .g:netrw_dav_cmd
bd!
endif
let result = s:NetrwGetFile(readcmd, tmpfile, b:netrw_method)
let b:netrw_lastfile = choice

".....
" rsync: NetRead Method #7 {{{3
elseif b:netrw_method == 7
" call Decho("read via rsync (method #7)")
" call Decho("exe ".s:netrw_silentxfer."!".g:netrw_rsync_cmd."

```

```

".shellescape(g:netrw_machine." : ".b:netrw_fname,1)." ".shellescape(tmpfile,1))
  exe s:netrw_silentxfer."!"g:netrw_rsync_cmd."
".shellescape(g:netrw_machine." : ".b:netrw_fname,1)." ".shellescape(tmpfile,1)
  let result = s:NetrwGetFile(readcmd,tmpfile, b:netrw_method)
  let b:netrw_lastfile = choice

".....
" fetch: NetRead Method #8 {{{3
"  fetch://[user@]host[:http]/path
elseif b:netrw_method == 8
"  call Decho("read via fetch (method #8)")
if g:netrw_fetch_cmd == ""
  if !exists("g:netrw_quiet")
    call netrw#ErrorMsg(s:ERROR,"fetch command not available",7)
  endif
"  call Dret("NetRead")
endif
if exists("g:netrw_option") && g:netrw_option == ":http"
  let netrw_option= "http"
else
  let netrw_option= "ftp"
endif
"  call Decho("read via fetch for ".netrw_option)

if exists("g:netrw_uid") && g:netrw_uid != "" && exists("s:netrw_passwd") && s:netrw_passwd != ""
"  call Decho("exe ".s:netrw_silentxfer."!"g:netrw_fetch_cmd." ".shellescape(tmpfile,1).")
".shellescape(netrw_option." : "/"g:netrw_uid."!:"s:netrw_passwd.'@'g:netrw_machine."/"b:netrw_fname,1))
  exe s:netrw_silentxfer."!"g:netrw_fetch_cmd." ".shellescape(tmpfile,1).")
".shellescape(netrw_option." : "/"g:netrw_uid."!:"s:netrw_passwd.'@'g:netrw_machine."/"b:netrw_fname,1)
  else
"  call Decho("exe ".s:netrw_silentxfer."!"g:netrw_fetch_cmd." ".shellescape(tmpfile,1).")
".shellescape(netrw_option." : "/"g:netrw_machine."/"b:netrw_fname,1))
  exe s:netrw_silentxfer."!"g:netrw_fetch_cmd." ".shellescape(tmpfile,1).")
".shellescape(netrw_option." : "/"g:netrw_machine."/"b:netrw_fname,1)
  endif

let result = s:NetrwGetFile(readcmd,tmpfile, b:netrw_method)
let b:netrw_lastfile = choice
setlocal ro

".....
" sftp: NetRead Method #9 {{{3
elseif b:netrw_method == 9
"  call Decho("read via sftp (method #9)")
"  call Decho("exe ".s:netrw_silentxfer."!"g:netrw_sftp_cmd."
".shellescape(g:netrw_machine." : ".b:netrw_fname,1).")
".tmpfile)
  exe s:netrw_silentxfer."!"g:netrw_sftp_cmd." ".shellescape(g:netrw_machine." : ".b:netrw_fname,1).") ".tmpfile

```



```

let result = s:NetrwGetFile(readcmd, tmpfile, b:netrw_method)
let b:netrw_lastfile = choice

" .....
" Complain {{{3
else
  call netrw#ErrorMsg(s:WARNING,"unable to comply with your request<" . choice . ">",8)
endif
endwhile

" cleanup {{{3
if exists("b:netrw_method")
"  call Decho("cleanup b:netrw_method and b:netrw_fname")
  unlet b:netrw_method
  unlet b:netrw_fname
endif
if s:FileReadable(tmpfile) && tmpfile !~ '.tar.bz2$' && tmpfile !~ '.tar.gz$' && tmpfile !~ '.zip' && tmpfile !~ '.tar'
&& readcmd != 't'
"  call Decho("cleanup by deleting tmpfile<".tmpfile.">")
  call s:NetrwDelete(tmpfile)
endif
call s:NetrwOptionRestore("w:")

" call Dret("netrw#NetRead :5 getcwd<".getcwd().">")
endfun

" -----
"
netrw#NetWrite: responsible for writing a file over the net {{{2
fun! netrw#NetWrite(...) range
"  call Dfunc("netrw#NetWrite(a:0=" .a:0.") ".g:loaded_netrw)

" option handling
let mod= 0
call s:NetrwOptionSave("w:")
call s:NetrwSafeOptions()

" Get Temporary Filename {{{3
let tmpfile= s:GetTempfile("")
if tmpfile == ""
"  call Dret("netrw#NetWrite : unable to get a tempfile!")
  return
endif

if a:0 == 0
  let ichoice = 0
else
  let ichoice = 1

```

```

endif

let curbufname= expand("%")
" call Decho("curbufname<".curbufname.">")
if &binary
" For binary writes, always write entire file.
" (line numbers don't really make sense for that).
" Also supports the writing of tar and zip files.
" call Decho("(write entire file) silent exe w! ".fnameescape(v:cmdarg)." ".fnameescape(tmpfile))
silent exe "w! ".fnameescape(v:cmdarg)." ".fnameescape(tmpfile)
elseif g:netrw_cygwin
" write (selected portion
of) file to temporary
let cygtmpfile= substitute(tmpfile,'/cygdrive/(\.)',\1:',")
" call Decho("(write selected portion) silent exe ".a:firstline.", " . a:lastline . "w! ".fnameescape(v:cmdarg)."
".fnameescape(cygtmpfile))
silent exe a:firstline.", " . a:lastline . "w! ".fnameescape(v:cmdarg)." ".fnameescape(cygtmpfile)
else
" write (selected portion of) file to temporary
" call Decho("(write selected portion) silent exe ".a:firstline.", " . a:lastline . "w! ".fnameescape(v:cmdarg)."
".fnameescape(tmpfile))
silent exe a:firstline.", " . a:lastline . "w! ".fnameescape(v:cmdarg)." ".fnameescape(tmpfile)
endif

if curbufname == ""
" if the file is [No Name], and one attempts to Nwrite it, the buffer takes
" on the temporary file's name. Deletion of the temporary file during
" cleanup then causes an error message.
Ofile!
endif

" While choice loop: {{{3
while ichoice <= a:0

" Process arguments: {{{4
" attempt to repeat
with previous host-file-etc
if exists("b:netrw_lastfile") && a:0 == 0
" call Decho("using b:netrw_lastfile<" . b:netrw_lastfile . ">")
let choice = b:netrw_lastfile
let ichoice= ichoice + 1
else
exe "let choice= a:" . ichoice

" Reconstruct Choice if choice starts with ""
if match(choice,"?") == 0
echomsg 'NetWrite Usage:'
echomsg ':Nwrite machine:path          uses rcp'

```

```

echomsg ':Nwrite "machine path"          uses ftp with <.netrc>'
echomsg ':Nwrite "machine id password path"  uses ftp'
echomsg ':Nwrite dav://[user@]machine/path    uses cadaver'
echomsg ':Nwrite fetch://[user@]machine/path  uses fetch'
echomsg ':Nwrite ftp://machine[#port]/path    uses ftp (autodetects <.netrc>)'
echomsg ':Nwrite rcp://machine/path          uses rcp'
echomsg ':Nwrite rsync://[user@]machine/path  uses rsync'
echomsg ':Nwrite scp://[user@]machine[:#]port]/path
uses scp'
echomsg ':Nwrite sftp://[user@]machine/path    uses sftp'
sleep 4
break

elseif match(choice,"^\\") != -1
if match(choice,"\\$" ) != -1
" case "..."
let choice=strpart(choice,1,strlen(choice)-2)
else
" case "... .. ..."
let choice = strpart(choice,1,strlen(choice)-1)
let wholechoice = ""

while match(choice,"\\$" ) == -1
let wholechoice= wholechoice . " " . choice
let ichoice = ichoice + 1
if choice > a:0
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,"Unbalanced string in filename ". wholechoice . """,13)
endif
" call Dret("netrw#NetWrite")
return
endif
let choice= a:{ichoice}
endwhile
let choice= strpart(wholechoice,1,strlen(wholechoice)-1) . " " . strpart(choice,0,strlen(choice)-1)
endif
endif
let ichoice= ichoice + 1
" call Decho("choice<"
. choice . "> ichoice=" . ichoice)

" Determine method of write (ftp, rcp, etc) {{{4
call s:NetrwMethod(choice)
if !exists("b:netrw_method") || b:netrw_method < 0
" call Dfunc("netrw#NetWrite : unsupported method")
return
endif

```

```

" =====
" Perform Protocol-Based Write {{{4
" =====
if exists("g:netrw_silent") && g:netrw_silent == 0 && &ch >= 1
  echo "(netrw) Processing your write request..."
"   call Decho("(netrw) Processing your write request...")
endif

".....
" rcp: NetWrite Method #1 {{{4
if b:netrw_method == 1
"   call Decho("write via rcp (method #1)")
if s:netrw_has_nt_rcp == 1
  if exists("g:netrw_uid") && ( g:netrw_uid != "" )
    let uid_machine = g:netrw_machine .'.' g:netrw_uid
  else
    let uid_machine = g:netrw_machine .'.' $USERNAME
  endif
else
  if exists("g:netrw_uid") && ( g:netrw_uid != ""
)
    let uid_machine = g:netrw_uid .'@'. g:netrw_machine
  else
    let uid_machine = g:netrw_machine
  endif
endif
"   call Decho("executing: !" g:netrw_rcp_cmd." " s:netrw_rcpmode." " shellescape(tmpfile,1)."
" shellescape(uid_machine." ":" b:netrw_fname,1))
  exe s:netrw_silentxfer." !" g:netrw_rcp_cmd." " s:netrw_rcpmode." " shellescape(tmpfile,1)."
" shellescape(uid_machine." ":" b:netrw_fname,1)
  let b:netrw_lastfile = choice

".....
" ftp + <.netrc>: NetWrite Method #2 {{{4
elseif b:netrw_method == 2
"   call Decho("write via ftp+.netrc (method #2)")
  let netrw_fname= b:netrw_fname
  new
"   call Decho("filter input window#".winnr())
  setlocal ff=unix
  put =g:netrw_ftpmode
"   call Decho("filter input: ".getline('$'))
  if exists("g:netrw_ftpextracmd")
    put =g:netrw_ftpextracmd
"   call Decho("filter input: ".getline("$"))
  endif
  call setline(line("$")+1,'put "'.tmpfile.'"

```

```

".netrw_fname.")
" call Decho("filter input: ".getline("$"))
if exists("g:netrw_port") && g:netrw_port != ""
" call Decho("executing: %!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)."
".shellescape(g:netrw_port,1))
exe s:netrw_silentxfer."%!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)."
".shellescape(g:netrw_port,1)
else
" call Decho("filter input window#".winnr())
" call Decho("executing: %!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1))
exe s:netrw_silentxfer."%!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)
endif
" If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
if getline(1) !~ "^$"
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,getline(1),14)
endif
let mod=1
endif
bd!
let b:netrw_lastfile = choice

".....
" ftp + machine, id, passwd, filename:
NetWrite Method #3 {{{4
elseif b:netrw_method == 3
" Construct execution string (four lines) which will be passed through filter
" call Decho("read via ftp+mipf (method #3)")
let netrw_fname= b:netrw_fname
new
setlocal ff=unix
if exists("g:netrw_port") && g:netrw_port != ""
put ='open '.g:netrw_machine.' '.g:netrw_port
" call Decho("filter input: ".getline('.'))
else
put ='open '.g:netrw_machine
" call Decho("filter input: ".getline('.'))
endif
if exists("g:netrw_ftp") && g:netrw_ftp == 1
put =g:netrw_uid
" call Decho("filter input: ".getline('.'))
put =\".s:netrw_passwd.\"
" call Decho("filter input: ".getline('.'))
else
put ='user \".g:netrw_uid.\" \".s:netrw_passwd.\"
" call Decho("filter input: ".getline('.'))
endif
put ='put \"'.tmpfile.\" \"'.netrw_fname.\"

```

```

" call Decho("filter input: ".getline('.'))
" save choice/id/password for future use
let b:netrw_lastfile = choice

" perform ftp:
" -i      : turns off interactive prompting from ftp
" -n unix : DON'T use <.netrc>, even though it exists
" -n win32: quit being obnoxious about password
norm! 1Gdd
" call Decho("executing: %!".g:netrw_ftp_cmd." -i -n")
exe s:netrw_silentxfer."%!".g:netrw_ftp_cmd." -i -n"
" If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
if getline(1) !~ "^$"
  if !exists("g:netrw_quiet")
    call netrw#ErrorMsg(s:ERROR,getline(1),15)
  endif
  let mod=1
endif
bd!

".....
" scp: NetWrite Method #4 {{{4
elseif b:netrw_method == 4
" call Decho("write via scp (method #4)")
if exists("g:netrw_port") && g:netrw_port != ""
  let useport= " ".g:netrw_scpport." ".fnameescape(g:netrw_port)
else
  let useport= ""
endif
" call Decho("exe ".s:netrw_silentxfer."!".g:netrw_scp_cmd.useport."
".shellescape(tmpfile,1)." ".shellescape(g:netrw_machine.":".b:netrw_fname,1))
exe s:netrw_silentxfer."!".g:netrw_scp_cmd.useport." ".shellescape(tmpfile,1)."
".shellescape(g:netrw_machine.":".b:netrw_fname,1)
let b:netrw_lastfile = choice

".....
" http: NetWrite Method #5 {{{4
elseif b:netrw_method == 5
" call Decho("write via http (method #5)")
if !exists("g:netrw_quiet")
  call netrw#ErrorMsg(s:ERROR,"currently <netrw.vim> does not support writing using http:",16)
endif

".....
" dav: NetWrite Method #6 (cadaver) {{{4
elseif b:netrw_method == 6
" call Decho("write via cadaver (method #6)")

```

```

" Construct execution string (four lines) which will be passed through filter
let netrw_fname= escape(b:netrw_fname,g:netrw_fname_escape)
new
setlocal ff=unix
if exists("g:netrw_port") && g:netrw_port != ""

put ='open 'g:netrw_machine.' 'g:netrw_port
else
put ='open 'g:netrw_machine
endif
if exists("g:netrw_uid") && exists("s:netrw_passwd")
put ='user 'g:netrw_uid.' 's:netrw_passwd
endif
put ='put 'tmpfile.' 'netrw_fname

" perform cadaver operation:
norm! 1Gdd
" call Decho("executing: %!"g:netrw_dav_cmd)
exe s:netrw_silentxfer."%!"g:netrw_dav_cmd
bd!
let b:netrw_lastfile = choice

".....
" rsync: NetWrite Method #7 {{{4
elseif b:netrw_method == 7
" call Decho("write via rsync (method #7)")
" call Decho("executing: !"g:netrw_rsync_cmd." ".shellescape(tmpfile,1)."
.shellescape(g:netrw_machine."".b:netrw_fname,1))
exe s:netrw_silentxfer."!"g:netrw_rsync_cmd." ".shellescape(tmpfile,1)."
.shellescape(g:netrw_machine."".b:netrw_fname,1)
let b:netrw_lastfile = choice

".....
" sftp: NetWrite Method
#9 {{{4
elseif b:netrw_method == 9
" call Decho("read via sftp (method #9)")
let netrw_fname= escape(b:netrw_fname,g:netrw_fname_escape)
if exists("g:netrw_uid") && ( g:netrw_uid != "" )
let uid_machine = g:netrw_uid .'@'. g:netrw_machine
else
let uid_machine = g:netrw_machine
endif
new
setlocal ff=unix
put ='put \"'.escape(tmpfile,'\\').\" 'netrw_fname
" call Decho("filter input: ".getline('.')')
norm! 1Gdd

```

```

" call Decho("executing: %!" .g:netrw_sftp_cmd.' '.shellescape(uid_machine,1))
exe s:netrw_silentxfer."%!" .g:netrw_sftp_cmd.' '.shellescape(uid_machine,1)
bd!
let b:netrw_lastfile= choice

" .....
" Complain {{{4
else
  call netrw#ErrorMsg(s:WARNING,"unable to comply with your request<" . choice . ">",17)
endif
endwhile

" Cleanup: {{{3
" call Decho("cleanup")
if s:FileReadable(tmpfile)
" call Decho("tmpfile<".tmpfile."> readable,
will now delete it")
  call s:NetrwDelete(tmpfile)
endif
call s:NetrwOptionRestore("w:")

if a:firstline == 1 && a:lastline == line("$")
" restore modifiability; usually equivalent to set nomod
let &mod= mod
endif

" call Dret("netrw#NetWrite")
endfun

" -----
" netrw#NetSource: source a remotely hosted vim script {{{2
" uses NetRead to get a copy of the file into a temporarily file,
" then sources that file,
" then removes that file.
fun! netrw#NetSource(...)
" call Dfunc("netrw#NetSource() a:0=" .a:0)
if a:0 > 0 && a:1 == '?'
" give help
echomsg 'NetSource Usage:'
echomsg ':Nsource dav://machine[:port]/path      uses cadaver'
echomsg ':Nsource fetch://machine/path              uses fetch'
echomsg ':Nsource ftp://[user@]machine[:port]/path    uses ftp  autodetects <.netrc>'
echomsg ':Nsource http://[user@]machine/path
  uses http  wget'
echomsg ':Nsource rcp://[user@]machine/path          uses rcp'
echomsg ':Nsource rsync://machine[:port]/path        uses rsync'
echomsg ':Nsource scp://[user@]machine[:#]port]/path  uses scp'
echomsg ':Nsource sftp://[user@]machine[:#]port]/path  uses sftp'

```



```

sleep 4
else
let i= 1
while i <= a:0
call netrw#NetRead(3,a:{i})
" call Decho("(netrw#NetSource) s:netread_tmpfile<".s:netrw_tmpfile.">")
if s:FileReadable(s:netrw_tmpfile)
" call Decho("(netrw#NetSource) exe so ".fnameescape(s:netrw_tmpfile))
exe "so ".fnameescape(s:netrw_tmpfile)
" call Decho("(netrw#NetSource) delete(".s:netrw_tmpfile.")")
call delete(s:netrw_tmpfile)
unlet s:netrw_tmpfile
else
call netrw#ErrorMsg(s:ERROR,"unable to source <".a:{i}.">!",48)
endif
let i= i + 1
endwhile
endif
" call Dret("netrw#NetSource")
endfun

" =====
" s:NetrwGetFile: Function
to read temporary file "tfile" with command "readcmd". {{{2
" readcmd == %r : replace buffer with newly read file
" == 0r : read file at top of buffer
" == r : read file after current line
" == t : leave file in temporary form (ie. don't read into buffer)
fun! s:NetrwGetFile(readcmd, tfile, method)
" call Dfunc("NetrwGetFile(readcmd<".a:readcmd.">,tfile<".a:tfile."> method<".a:method.">")

" readcmd=='t': simply do nothing
if a:readcmd == 't'
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("NetrwGetFile : skip read of <".a:tfile.">")
return
endif

" get name of remote filename (ie. url and all)
let rfile= bufname("%")
" call Decho("rfile<".rfile.">")

if exists("*NetReadFixup")
" for the use of NetReadFixup (not otherwise used internally)
let line2= line("$")
endif

if a:readcmd[0] == '%'

```

```

" get file into buffer
" call Decho("get file into buffer")

" rename the current buffer to the temp file (ie. tfile)
if g:netrw_cygwin
  let tfile= substitute(a:tfile,'/cygdrive/^(.)','\1:',")
else
  let tfile= a:tfile
endif
" call Decho("exe silent! keepalt file ".fnameescape(tfile))
exe "silent! keepalt file ".fnameescape(tfile)

" edit temporary file (ie. read the temporary file in)
if rfile =~ '\.zip$'
" call Decho("handling remote zip file with zip#Browse(tfile<".tfile.">")
  call zip#Browse(tfile)
elseif rfile =~ '\.tar$'
" call Decho("handling remote tar file with tar#Browse(tfile<".tfile.">")
  call tar#Browse(tfile)
elseif rfile =~ '\.tar\.gz'
" call Decho("handling remote gzip-compressed tar file")
  call tar#Browse(tfile)
elseif rfile =~ '\.tar\.bz2'
" call Decho("handling remote bz2-compressed tar file")
  call tar#Browse(tfile)
else
" call Decho("edit temporary file")
  e!
endif

" rename buffer back to remote filename
"
call Decho("exe silent! keepalt file ".fnameescape(rfile))
exe "silent! keepalt file ".fnameescape(rfile)
if a:method == 5
  set ft=html
else
  filetype detect
endif
" call Dredir("renamed buffer back to remote filename<".rfile."> : expand(%<".expand("%").">","ls!")
let line1 = 1
let line2 = line("$")

elseif s:FileReadable(a:tfile)
" read file after current line
" call Decho("read file<".a:tfile."> after current line")
let curline = line(".")
let lastline= line("$")

```

```

" call Decho("exe<".a:readcmd." ".fnameescape(v:cmdarg)." ".fnameescape(a:tfile)."> line#".curline)
exe a:readcmd." ".fnameescape(v:cmdarg)." ".fnameescape(a:tfile)
let line1= curline + 1
let line2= line("$") - lastline + 1

else
" not readable
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Decho("tfile<".a:tfile."> not readable")
call netrw#ErrorMsg(s:WARNING,"file <".a:tfile."> not readable",9)
" call
Dret("NetrwGetFile : tfile<".a:tfile."> not readable")
return
endif

" User-provided (ie. optional) fix-it-up command
if exists("*NetReadFixup")
" call Decho("calling NetReadFixup(method<".a:method."> line1=".line1." line2=".line2.")")
call NetReadFixup(a:method, line1, line2)
" else " Decho
" call Decho("NetReadFixup() not called, doesn't exist (line1=".line1." line2=".line2.")")
endif

if has("gui") && has("menu") && has("gui_running") && &go =~ 'm'
" update the Buffers menu
call s:UpdateBuffersMenu()
endif

" call Decho("readcmd<".a:readcmd."> cmdarg<".v:cmdarg."> tfile<".a:tfile."> readable=".s:FileReadable(a:tfile))

" make sure file is being displayed
" redraw!

" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("NetrwGetFile")
endfun

" -----
" s:NetrwMethod: determine method of transfer {{{2
" Input:
" choice = url
" [protocol:]//[userid@]hostname[:port]/[path-to-file]
" Output:
" b:netrw_method= 1: rcp
"           2: ftp + <.netrc>
"           3: ftp + machine, id, password, and [path]filename
"           4: scp
"           5: http (wget)

```

```

"      6: dav
"      7: rsync
"      8: fetch
"      9: sftp
" g:netrw_machine= hostname
" b:netrw_fname = filename
" g:netrw_port = optional port number (for ftp)
" g:netrw_choice = copy of input url (choice)
fun! s:NetrwMethod(choice)
" call Dfunc("NetrwMethod(a:choice<".a:choice.">")

" record current g:netrw_machine, if any
" curmachine used if protocol == ftp and no .netrc
if exists("g:netrw_machine")
    let curmachine= g:netrw_machine
" call Decho("curmachine<".curmachine.">")
else
    let curmachine= "N O T A HOST"
endif

" initialization
let b:netrw_method = 0
let g:netrw_machine = ""
let b:netrw_fname = ""
let g:netrw_port = ""
let g:netrw_choice = a:choice

" Patterns:
" mipf  : a:machine a:id password filename    Use ftp
" mf    : a:machine filename                  Use ftp + <.netrc> or g:netrw_uid s:netrw_passwd
" ftpurm : ftp://[user@]host[[:#:]port]/filename Use ftp + <.netrc> or g:netrw_uid s:netrw_passwd
" rcpurm : rcp://[user@]host/filename         Use rcp
" rcphf  : [user@]host:filename               Use rcp
" scpurm : scp://[user@]host[[:#:]port]/filename Use scp
" httpurm : http://[user@]host/filename       Use wget
" davurm : dav[s]://host[:port]/path          Use cadaver/curl
" rsyncurm : rsync://host[:port]/path         Use rsync
" fetchurm : fetch://[user@]host[:http]/filename Use
fetch (defaults to ftp, override for http)
" sftpurm : sftp://[user@]host/filename Use scp
let mipf  = '^(\S+)\s+(\S+)\s+(\S+)\s+(\S+)\s$'
let mf    = '^(\S+)\s+(\S+)\s$'
let ftpurm = '^ftp://(\([^@]\{-}\)@)\=(\[^#\]\{-}\)(\[:#:\]d+)\=(\(.*)$'
let rcpurm = '^rcp://%(\([^@]\{-}\)@)\=(\[^]\{-}\)(\(.*)$'
let rcphf  = '^(\([h]w*\))@)\=(\([h]w*\)):(\[^@]\+)$'
let scpurm = '^scp://(\[^#\]\+)\%(\[:#:\]d+)\=(\(.*)$'
let httpurm = '^http://(\[^]\{-}\)(\(.*)\)= $'
let davurm = '^davs\=://(\[^]\+)\^(.\^)\([-_.~[:alnum:]]\+)$'

```

```

let rsyncurm = '^rsync:/\([^/]\{-}\)\(.*\)|= '$'
let fetchurm = '^fetch:/\(\(\([^/@]\{-}\)@\)\)=\(\([^#:]\{-}\)\(:http)\)=\(.*\) '$'
let sftpurm = '^sftp:/\([^/]\{-}\)\(.*\)|= '$'

" call Decho("determine method:")
" Determine Method
" rcp://user@hostname/...path-to-file
if match(a:choice,rcpurm) == 0
" call Decho("rcp://...")
let b:netrw_method = 1
let userid
    = substitute(a:choice,rcpurm,'\1','')
let g:netrw_machine = substitute(a:choice,rcpurm,'\2','')
let b:netrw_fname = substitute(a:choice,rcpurm,'\3','')
if userid != ""
let g:netrw_uid= userid
endif

" scp://user@hostname/...path-to-file
elseif match(a:choice,scpurm) == 0
" call Decho("scp://...")
let b:netrw_method = 4
let g:netrw_machine = substitute(a:choice,scpurm,'\1','')
let g:netrw_port = substitute(a:choice,scpurm,'\2','')
let b:netrw_fname = substitute(a:choice,scpurm,'\3','')

" http://user@hostname/...path-to-file
elseif match(a:choice,httpurm) == 0
" call Decho("http://...")
let b:netrw_method = 5
let g:netrw_machine= substitute(a:choice,httpurm,'\1','')
let b:netrw_fname = substitute(a:choice,httpurm,'\2','')

" dav://hostname[:port]/..path-to-file..
elseif match(a:choice,davurm) == 0
" call Decho("dav://...")
let b:netrw_method= 6
if a:choice =~ '^s'
let g:netrw_machine=
'https://'.substitute(a:choice,davurm,'\1\2','')
else
let g:netrw_machine= 'http://'.substitute(a:choice,davurm,'\1\2','')
endif
let b:netrw_fname = substitute(a:choice,davurm,'\3','')

" rsync://user@hostname/...path-to-file
elseif match(a:choice,rsyncurm) == 0
" call Decho("rsync://...")

```

```

let b:netrw_method = 7
let g:netrw_machine= substitute(a:choice,rsyncurm,'\1',"")
let b:netrw_fname = substitute(a:choice,rsyncurm,'\2',"")

" ftp://[user@]hostname[:#]port/...path-to-file
elseif match(a:choice,ftpurm) == 0
" call Decho("ftp://...")
let userid = substitute(a:choice,ftpurm,'\2',"")
let g:netrw_machine= substitute(a:choice,ftpurm,'\3',"")
let g:netrw_port = substitute(a:choice,ftpurm,'\4',"")
let b:netrw_fname = substitute(a:choice,ftpurm,'\5',"")
" call Decho("g:netrw_machine<"g:netrw_machine.">")
if userid != ""
let g:netrw_uid= userid
endif
if exists("s:netrw_passwd") && curmachine
!= g:netrw_machine
" if there's a change in hostname, require password re-entry
unlet s:netrw_passwd
endif
if exists("g:netrw_uid") && exists("s:netrw_passwd")
let b:netrw_method = 3
else
if s:FileReadable(expand("$HOME/.netrc")) && !g:netrw_ignorenetrc
let b:netrw_method= 2
else
if !exists("g:netrw_uid") || g:netrw_uid == ""
call NetUserPass()
elseif !exists("s:netrw_passwd") || s:netrw_passwd == ""
call NetUserPass(g:netrw_uid)
" else just use current g:netrw_uid and s:netrw_passwd
endif
let b:netrw_method= 3
endif
endif

elseif match(a:choice,fetchurm) == 0
" call Decho("fetch://...")
let b:netrw_method = 8
let g:netrw_userid = substitute(a:choice,fetchurm,'\2',"")
let g:netrw_machine= substitute(a:choice,fetchurm,'\3',"")
let b:netrw_option = substitute(a:choice,fetchurm,'\4',"")
let b:netrw_fname = substitute(a:choice,fetchurm,'\5',"")

" Issue an
ftp : "machine id password [path/]filename"
elseif match(a:choice,mipf) == 0
" call Decho("(ftp) host id pass file")

```

```

let b:netrw_method = 3
let g:netrw_machine = substitute(a:choice,mipf,'\1',"")
let g:netrw_uid = substitute(a:choice,mipf,'\2',"")
let s:netrw_passwd = substitute(a:choice,mipf,'\3',"")
let b:netrw_fname = substitute(a:choice,mipf,'\4',"")

" Issue an ftp: "hostname [path/]filename"
elseif match(a:choice,mf) == 0
" call Decho("(ftp) host file")
if exists("g:netrw_uid") && exists("s:netrw_passwd")
let b:netrw_method = 3
let g:netrw_machine = substitute(a:choice,mf,'\1',"")
let b:netrw_fname = substitute(a:choice,mf,'\2',"")

elseif s:FileReadable(expand("$HOME/.netrc"))
let b:netrw_method = 2
let g:netrw_machine = substitute(a:choice,mf,'\1',"")
let b:netrw_fname = substitute(a:choice,mf,'\2',"")
endif

" sftp://user@hostname/...path-to-file
elseif match(a:choice,sftpurm)
== 0
" call Decho("sftp://...")
let b:netrw_method = 9
let g:netrw_machine= substitute(a:choice,sftpurm,'\1',"")
let b:netrw_fname = substitute(a:choice,sftpurm,'\2',"")

" Issue an rcp: hostname:filename" (this one should be last)
elseif match(a:choice,rcphf) == 0
" call Decho("(rcp) [user@]host:file) rcphf<" .rcphf.">")
let b:netrw_method = 1
let userid = substitute(a:choice,rcphf,'\2',"")
let g:netrw_machine = substitute(a:choice,rcphf,'\3',"")
let b:netrw_fname = substitute(a:choice,rcphf,'\4',"")
" call Decho("\1<'.substitute(a:choice,rcphf,'\1',"").">")
" call Decho("\2<'.substitute(a:choice,rcphf,'\2',"").">")
" call Decho("\3<'.substitute(a:choice,rcphf,'\3',"").">")
" call Decho("\4<'.substitute(a:choice,rcphf,'\4',"").">")
if userid != ""
let g:netrw_uid= userid
endif

else
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:WARNING,"cannot determine method (format:
protocol://[user@]hostname[:port]/[path])",45)

```

```

endif
let b:netrw_method = -1
endif

" remove any leading [#] from port number
if g:netrw_port != ""
  let g:netrw_port = substitute(g:netrw_port, '[#:]\+', ',')
endif

" call Decho("a:choice <.a:choice.>")
" call Decho("b:netrw_method <.b:netrw_method.>")
" call Decho("g:netrw_machine<.g:netrw_machine.>")
" call Decho("g:netrw_port <.g:netrw_port.>")
" if exists("g:netrw_uid") "Decho
" call Decho("g:netrw_uid <.g:netrw_uid.>")
" endif "Decho
" if exists("s:netrw_passwd") "Decho
" call Decho("s:netrw_passwd <.s:netrw_passwd.>")
" endif "Decho
" call Decho("b:netrw_fname <.b:netrw_fname.>")
" call Dret("NetrwMethod : b:netrw_method=".b:netrw_method)
endfun

" -----
" NetReadFixup: this sort of function is typically written by the user {{{2
"   to handle extra junk that their system's ftp dumps
"
"   into the transfer. This function is provided as an
"   example and as a fix for a Windows 95 problem: in my
"   experience, win95's ftp always dumped four blank lines
"   at the end of the transfer.
if has("win95") && exists("g:netrw_win95ftp") && g:netrw_win95ftp
fun! NetReadFixup(method, line1, line2)
" call Dfunc("NetReadFixup(method<.a:method.> line1=".a:line1." line2=".a:line2.")")

" sanity checks -- attempt to convert inputs to integers
let method = a:method + 0
let line1 = a:line1 + 0
let line2 = a:line2 + 0
if type(method) != 0 || type(line1) != 0 || type(line2) != 0 || method < 0 || line1 <= 0 || line2 <= 0
" call Dret("NetReadFixup")
return
endif

if method == 3 " ftp (no <.netrc>)
let fourblanklines= line2 - 3
if fourblanklines >= line1
exe "silent ".fourblanklines.", ".line2."g/^\s*$/d"

```



```

endif
endif

" call Dret("NetReadFixup")
endfun
endif

"
-----
" NetUserPass: set username and password for subsequent ftp transfer {{{2
" Usage: :call NetUserPass() -- will prompt for userid and password
" :call NetUserPass("uid") -- will prompt for password
" :call NetUserPass("uid","password") -- sets global userid and password
fun! NetUserPass(...)

" get/set userid
if a:0 == 0
" call Dfunc("NetUserPass(a:0<"a:0.">)")
if !exists("g:netrw_uid") || g:netrw_uid == ""
" via prompt
let g:netrw_uid= input('Enter username: ')
endif
else " from command line
" call Dfunc("NetUserPass(a:1<"a:1.">) {")
let g:netrw_uid= a:1
endif

" get password
if a:0 <= 1 " via prompt
" call Decho("a:0="a:0." case <=1:")
let s:netrw_passwd= inputsecret("Enter Password: ")
else " from command line
" call Decho("a:0="a:0." case >1: a:2<"a:2.">")
let s:netrw_passwd=a:2
endif

" call Dret("NetUserPass")
endfun

" =====
"
Shared Browsing Support: {{{1
" =====

" -----
" s:BrowserMaps: {{{2
fun! s:BrowserMaps(islocal)
" call Dfunc("s:BrowserMaps(islocal="a:islocal.") b:netrw_curdir<"b:netrw_curdir.">")

```

```

if a:islocal
" call Decho("make local maps")
nnoemap <buffer> <silent> <cr> :call
netrw#LocalBrowseCheck(<SID>NetrwBrowseChgDir(1,<SID>NetrwGetWord())<cr>
nnoemap <buffer> <silent> - :exe "norm! 0"<bar>call
netrw#LocalBrowseCheck(<SID>NetrwBrowseChgDir(1,'./'))<cr>
nnoemap <buffer> <silent> a :call <SID>NetrwHide(1)<cr>
nnoemap <buffer> <silent> mb :<c-u>call <SID>NetrwBookHistHandler(0,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> mc :<c-u>call <SID>NetrwMarkFileCopy(1)<cr>
nnoemap <buffer> <silent> md :<c-u>call <SID>NetrwMarkFileDiff(1)<cr>
nnoemap <buffer> <silent> me :<c-u>call <SID>NetrwMarkFileEdit(1)<cr>
nnoemap <buffer> <silent> mf :<c-u>call <SID>NetrwMarkFile(1,<SID>NetrwGetWord())<cr>
nnoemap <buffer> <silent> mg :<c-u>call <SID>NetrwMarkFileGrep(1)<cr>
nnoemap <buffer> <silent> mh :<c-u>call <SID>NetrwMarkHideSfx(1)<cr>
nnoemap <buffer> <silent> mm :<c-u>call <SID>NetrwMarkFileMove(1)<cr>
nnoemap <buffer> <silent> mp :<c-u>call <SID>NetrwMarkFilePrint(1)<cr>
nnoemap <buffer> <silent> mr :<c-u>call <SID>NetrwMarkFileRegexp(1)<cr>
nnoemap <buffer> <silent> ms :<c-u>call <SID>NetrwMarkFileSource(1)<cr>
nnoemap <buffer> <silent> mT :<c-u>call <SID>NetrwMarkFileTag(1)<cr>
nnoemap <buffer> <silent> mt :<c-u>call <SID>NetrwMarkFileTgt(1)<cr>
nnoemap <buffer> <silent> mu :<c-u>call <SID>NetrwUnMarkFile(1)<cr>
nnoemap <buffer> <silent> mx :<c-u>call <SID>NetrwMarkFileExe(1)<cr>
nnoemap <buffer> <silent> mz :<c-u>call <SID>NetrwMarkFileCompress(1)<cr>
nnoemap <buffer> <silent> gb :<c-u>call <SID>NetrwBookHistHandler(1,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> gh :<c-u>call <SID>NetrwHidden(1)<cr>
nnoemap <buffer> <silent> c :exe "keepjumps lcd ".fnameescape(b:netrw_curdir)<cr>
nnoemap <buffer> <silent> C :let g:netrw_chgwin= winnr()<cr>
nnoemap <buffer> <silent> d :call <SID>NetrwMakeDir("")<cr>
nnoemap <buffer> <silent> i :call <SID>NetrwListStyle(1)<cr>
nnoemap <buffer> <silent> o :call <SID>NetrwSplit(3)<cr>
nnoemap <buffer> <silent> O :call <SID>NetrwObtain(1)<cr>
nnoemap <buffer> <silent> p :call
<SID>NetrwPreview(<SID>NetrwBrowseChgDir(1,<SID>NetrwGetWord(),1))<cr>
nnoemap <buffer> <silent> P :call <SID>NetrwPrevWinOpen(1)<cr>
nnoemap <buffer> <silent> qb :<c-u>call <SID>NetrwBookHistHandler(2,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> mB :<c-u>call <SID>NetrwBookHistHandler(6,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> qf :<c-u>call <SID>NetrwFileInfo(1,<SID>NetrwGetWord())<cr>
nnoemap <buffer> <silent> r :let
g:netrw_sort_direction= (g:netrw_sort_direction =~ 'n')? 'r' : 'n'<bar>exe "norm! 0"<bar>call
<SID>NetrwRefresh(1,<SID>NetrwBrowseChgDir(1,'./'))<cr>
nnoemap <buffer> <silent> s :call <SID>NetrwSortStyle(1)<cr>
nnoemap <buffer> <silent> S :call <SID>NetSortSequence(1)<cr>
nnoemap <buffer> <silent> t :call <SID>NetrwSplit(4)<cr>
nnoemap <buffer> <silent> u :<c-u>call <SID>NetrwBookHistHandler(4,expand("%"))<cr>
nnoemap <buffer> <silent> U :<c-u>call <SID>NetrwBookHistHandler(5,expand("%"))<cr>
nnoemap <buffer> <silent> v :call <SID>NetrwSplit(5)<cr>
nnoemap <buffer> <silent> x :call
netrw#NetrwBrowseX(<SID>NetrwBrowseChgDir(1,<SID>NetrwGetWord(),0,0)"<cr>

```

```

nnoemap <buffer> <silent> % :call <SID>NetrwOpenFile(1)<cr>
if !hasmapto('<Plug>NetrwHideEdit')
nmap <buffer> <unique> <c-h> <Plug>NetrwHideEdit
endif
nnoemap <buffer> <silent> <Plug>NetrwHideEdit :call <SID>NetrwHideEdit(1)<cr>
if !hasmapto('<Plug>NetrwRefresh')
nmap <buffer> <unique> <c-l> <Plug>NetrwRefresh
endif
nnoemap <buffer> <silent> <Plug>NetrwRefresh :call
<SID>NetrwRefresh(1,<SID>NetrwBrowseChgDir(1,'./'))<cr>
if s:didstarstar || !mapcheck("<s-down>","n")
nnoemap <buffer> <silent> <s-down> :Nexplore<cr>
endif
if s:didstarstar || !mapcheck("<s-up>","n")
nnoemap <buffer> <silent> <s-up> :Pexplore<cr>
endif
let mapsafecurdir = escape(b:netrw_curdir, s:netrw_map_escape)
if g:netrw_mousemaps == 1
nnoemap <buffer> <silent> <leftmouse> <leftmouse>:call <SID>NetrwLeftmouse(1)<cr>
nnoemap <buffer> <silent> <middlemouse> <leftmouse>:call <SID>NetrwPrevWinOpen(1)<cr>
nnoemap <buffer> <silent> <s-leftmouse> <leftmouse>:call
<SID>NetrwMarkFile(1,<SID>NetrwGetWord())<cr>
exe 'nnoemap <buffer> <silent> <rightmouse> <leftmouse>:call <SID>NetrwLocalRm(".mapsafecurdir.")<cr>'
exe 'vnoemap <buffer> <silent> <rightmouse> <leftmouse>:call <SID>NetrwLocalRm(".mapsafecurdir.")<cr>'
endif
exe 'nnoemap <buffer> <silent> <del> :call <SID>NetrwLocalRm(".mapsafecurdir.")<cr>'
exe 'vnoemap <buffer> <silent> <del> :call <SID>NetrwLocalRm(".mapsafecurdir.")<cr>'
exe 'nnoemap <buffer> <silent> D :call <SID>NetrwLocalRm(".mapsafecurdir.")<cr>'
exe 'vnoemap <buffer> <silent> D :call <SID>NetrwLocalRm(".mapsafecurdir.")<cr>'
exe 'nnoemap <buffer> <silent> R :call <SID>NetrwLocalRename(".mapsafecurdir.")<cr>'
exe 'vnoemap <buffer> <silent> R :call <SID>NetrwLocalRename(".mapsafecurdir.")<cr>'
exe 'nnoemap <buffer> <silent> <Leader>m :call <SID>NetrwMakeDir("")<cr>'
nnoemap <buffer> <F1> :he netrw-quickhelp<cr>

else " remote
" call Decho("make remote maps")
call s:RemotePathAnalysis(b:netrw_curdir)
nnoemap <buffer> <silent> <cr> :call
<SID>NetrwBrowse(0,<SID>NetrwBrowseChgDir(0,<SID>NetrwGetWord()))<cr>
nnoemap <buffer> <silent> <c-l> :call <SID>NetrwRefresh(0,<SID>NetrwBrowseChgDir(0,'./'))<cr>
nnoemap <buffer> <silent> - :exe "norm! 0"<bar>call
<SID>NetrwBrowse(0,<SID>NetrwBrowseChgDir(0,'./'))<cr>
nnoemap <buffer> <silent> a :call <SID>NetrwHide(0)<cr>
nnoemap <buffer> <silent> mb :<c-u>call <SID>NetrwBookHistHandler(0,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> mc :<c-u>call <SID>NetrwMarkFileCopy(0)<cr>
nnoemap <buffer> <silent> md :<c-u>call <SID>NetrwMarkFileDiff(0)<cr>
nnoemap <buffer> <silent> me :<c-u>call <SID>NetrwMarkFileEdit(0)<cr>
nnoemap <buffer> <silent> mf :<c-u>call <SID>NetrwMarkFile(0,<SID>NetrwGetWord())<cr>

```

```

nnoemap <buffer> <silent> mg :<c-u>call <SID>NetrwMarkFileGrep(0)<cr>
nnoemap <buffer> <silent> mh :<c-u>call <SID>NetrwMarkHideSfx(0)<cr>
nnoemap <buffer> <silent> mm :<c-u>call <SID>NetrwMarkFileMove(0)<cr>
nnoemap <buffer> <silent> mp :<c-u>call <SID>NetrwMarkFilePrint(0)<cr>
nnoemap <buffer> <silent> mr :<c-u>call <SID>NetrwMarkFileRegexp(0)<cr>
nnoemap <buffer> <silent>
ms :<c-u>call <SID>NetrwMarkFileSource(0)<cr>
nnoemap <buffer> <silent> mT :<c-u>call <SID>NetrwMarkFileTag(0)<cr>
nnoemap <buffer> <silent> mt :<c-u>call <SID>NetrwMarkFileTgt(0)<cr>
nnoemap <buffer> <silent> mu :<c-u>call <SID>NetrwUnMarkFile(0)<cr>
nnoemap <buffer> <silent> mx :<c-u>call <SID>NetrwMarkFileExe(0)<cr>
nnoemap <buffer> <silent> mz :<c-u>call <SID>NetrwMarkFileCompress(0)<cr>
nnoemap <buffer> <silent> gb :<c-u>call <SID>NetrwBookHistHandler(1,b:netrw_cur)<cr>
nnoemap <buffer> <silent> gh :<c-u>call <SID>NetrwHidden(0)<cr>
nnoemap <buffer> <silent> C :let g:netrw_chgwin= winnr()<cr>
nnoemap <buffer> <silent> i :call <SID>NetrwListStyle(0)<cr>
nnoemap <buffer> <silent> o :call <SID>NetrwSplit(0)<cr>
nnoemap <buffer> <silent> O :call <SID>NetrwObtain(0)<cr>
nnoemap <buffer> <silent> p :call
<SID>NetrwPreview(<SID>NetrwBrowseChgDir(1,<SID>NetrwGetWord(),1))<cr>
nnoemap <buffer> <silent> P :call <SID>NetrwPrevWinOpen(0)<cr>
nnoemap <buffer> <silent> qb :<c-u>call <SID>NetrwBookHistHandler(2,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> mB :<c-u>call <SID>NetrwBookHistHandler(6,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> qf :<c-u>call <SID>NetrwFileInfo(0,<SID>NetrwGetWord())<cr>
nnoemap <buffer> <silent> r :let g:netrw_sort_direction= (g:netrw_sort_direction =~ 'n')? 'r' : 'n'<bar>exe "norm!
0"<bar>call <SID>NetrwBrowse(0,<SID>NetrwBrowseChgDir(0,'/'))<cr>
nnoemap <buffer> <silent> s :call <SID>NetrwSortStyle(0)<cr>
nnoemap <buffer> <silent> S :call <SID>NetSortSequence(0)<cr>
nnoemap <buffer> <silent> t :call <SID>NetrwSplit(1)<cr>
nnoemap <buffer> <silent> u :<c-u>call <SID>NetrwBookHistHandler(4,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> U :<c-u>call <SID>NetrwBookHistHandler(5,b:netrw_curdir)<cr>
nnoemap <buffer> <silent> v :call <SID>NetrwSplit(2)<cr>
nnoemap <buffer> <silent> x :call
netrw#NetrwBrowseX(<SID>NetrwBrowseChgDir(0,<SID>NetrwGetWord()),1)<cr>
nnoemap <buffer> <silent> % :call <SID>NetrwOpenFile(0)<cr>
if !hasmapto('<Plug>NetrwHideEdit')
nmap <buffer> <c-h> <Plug>NetrwHideEdit
endif
nnoemap <buffer> <silent> <Plug>NetrwHideEdit :call <SID>NetrwHideEdit(0)<cr>
if !hasmapto('<Plug>NetrwRefresh')
nmap <buffer> <c-l> <Plug>NetrwRefresh
endif

let mapsafepath = escape(s:path, s:netrw_map_escape)
let mapsafeusermach = escape(s:user.s:machine, s:netrw_map_escape)

nnoemap <buffer> <silent> <Plug>NetrwRefresh :call
<SID>NetrwRefresh(0,<SID>NetrwBrowseChgDir(0,'/'))<cr>

```

```

if g:netrw_mousemaps == 1
  noremap <buffer> <silent> <leftmouse> <leftmouse>:call <SID>NetrwLeftmouse(0)<cr>
  noremap <buffer> <silent> <middlemouse> <leftmouse>:call <SID>NetrwPrevWinOpen(0)<cr>
  noremap <buffer> <silent> <s-leftmouse> <leftmouse>:call
<SID>NetrwMarkFile(0,<SID>NetrwGetWord())<cr>
  exe 'noremap <buffer> <silent> <rightmouse>
<leftmouse>:call <SID>NetrwRemoteRm(".mapsafeusermach.", ".mapsafepath.")<cr>'
  exe 'vnoremap <buffer> <silent> <rightmouse> <leftmouse>:call
<SID>NetrwRemoteRm(".mapsafeusermach.", ".mapsafepath.")<cr>'
endif
exe 'noremap <buffer> <silent> <del> :call <SID>NetrwRemoteRm(".mapsafeusermach.", ".mapsafepath.")<cr>'
exe 'vnoremap <buffer> <silent> <del> :call <SID>NetrwRemoteRm(".mapsafeusermach.", ".mapsafepath.")<cr>'
exe 'noremap <buffer> <silent> d :call <SID>NetrwMakeDir(".mapsafeusermach.")<cr>'
exe 'noremap <buffer> <silent> D :call <SID>NetrwRemoteRm(".mapsafeusermach.", ".mapsafepath.")<cr>'
exe 'vnoremap <buffer> <silent> D :call <SID>NetrwRemoteRm(".mapsafeusermach.", ".mapsafepath.")<cr>'
exe 'noremap <buffer> <silent> R :call <SID>NetrwRemoteRename(".mapsafeusermach.", ".mapsafepath.")<cr>'
exe 'vnoremap <buffer> <silent> R :call <SID>NetrwRemoteRename(".mapsafeusermach.", ".mapsafepath.")<cr>'
noremap
<buffer> <F1> :he netrw-quickhelp<cr>
endif
call s:SetRexDir(a:islocal,b:netrw_curdir)
" call Dret("s:BrowserMaps")
endfun

" -----
" s:ExplorePatHls: converts an Explore pattern into a regular expression search pattern {{{2
fun! s:ExplorePatHls(pattern)
" call Dfunc("s:ExplorePatHls(pattern<"a:pattern.">)")
let repat= substitute(a:pattern,'^**^\{1,2}',",")
" call Decho("repat<".repat.">")
let repat= escape(repat,'[.\|]')
" call Decho("repat<".repat.">")
let repat= '<' . substitute(repat,'*', '\(\|S\|+ \|)\*\|S\|+', 'g') . '>'
" call Dret("s:ExplorePatHls repat<".repat.">")
return repat
endfun

" -----
" s:NetrwBookHistHandler: {{{2
" 0: (user: <mb>) bookmark current directory
" 1: (user: <gb>) change to the bookmarked directory
" 2: (user: <qb>) list bookmarks
" 3: (browsing) record current
directory history
" 4: (user: <u>) go up (previous) bookmark
" 5: (user: <U>) go down (next) bookmark
" 6: (user: <mB>) delete bookmark
fun! s:NetrwBookHistHandler(chg,curdir)

```

```

" call Dfunc("NetrwBookHistHandler(chg=".a:chg." curdir<".a:curdir.">) cnt=".v:count."
histcnt=".g:netrw_dirhist_cnt." histmax=".g:netrw_dirhistmax)

if a:chg == 0
" bookmark the current directory
" call Decho("(user: <b>) bookmark the current directory")
if !exists("g:netrw_bookmarklist")
let g:netrw_bookmarklist= []
endif
if index(g:netrw_bookmarklist,a:curdir) == -1
" curdir not currently in g:netrw_bookmarklist, so include it
call add(g:netrw_bookmarklist,a:curdir)
call sort(g:netrw_bookmarklist)
endif
echo "bookmarked the current directory"

elseif a:chg == 1
" change to the bookmarked directory
" call Decho("(user: <.v:count."mb>) change to the bookmarked directory")
if exists("g:netrw_bookmarklist[v:count-1]")
exe "e ".fnameescape(g:netrw_bookmarklist[v:count-1])
else
echomsg "Sorry, bookmark#" .v:count." doesn't exist!"
endif

elseif a:chg == 2
" redraw!
let didwork= 0
" list user's bookmarks
" call Decho("(user: <q>) list user's bookmarks")
if exists("g:netrw_bookmarklist")
" call Decho('list '.len(g:netrw_bookmarklist).' bookmarks')
let cnt= 1
for bmd in g:netrw_bookmarklist
" call Decho("Netrw Bookmark#" .cnt.": ".g:netrw_bookmarklist[cnt-1])
echo "Netrw Bookmark#" .cnt.": ".g:netrw_bookmarklist[cnt-1]
let didwork = 1
let cnt = cnt + 1
endfor
endif

" list directory history
let cnt = g:netrw_dirhist_cnt
let first = 1
let histcnt = 0
while ( first || cnt != g:netrw_dirhist_cnt )
" call Decho("first=".first." cnt=".cnt." dirhist_cnt=".g:netrw_dirhist_cnt)
let histcnt= histcnt + 1

```

```

if exists("g:netrw_dirhist_{cnt}")
"  call Decho("Netrw History#.histcnt.": ".g:netrw_dirhist_{cnt}")
  echo "Netrw History#.histcnt.": ".g:netrw_dirhist_{cnt}"
  let didwork= 1
endif
let first = 0
let cnt = ( cnt - 1 ) % g:netrw_dirhistmax
if cnt < 0
  let cnt= cnt + g:netrw_dirhistmax
endif
endwhile
if didwork
  call inputsave()|call input("Press <cr> to continue")|call inputrestore()
endif

elseif a:chg == 3
" saves most recently visited directories (when they differ)
"  call Decho("(browsing) record curdir history")
  if !exists("g:netrw_dirhist_cnt") || !exists("g:netrw_dirhist_{g:netrw_dirhist_cnt}") ||
g:netrw_dirhist_{g:netrw_dirhist_cnt} != a:curdir
    let g:netrw_dirhist_cnt = ( g:netrw_dirhist_cnt + 1 ) % g:netrw_dirhistmax
    let g:netrw_dirhist_{g:netrw_dirhist_cnt} = a:curdir
"  call Decho("save dirhist#.g:netrw_dirhist_cnt.<" .g:netrw_dirhist_{g:netrw_dirhist_cnt}.>")
endif

elseif a:chg == 4
" u: change to the previous directory stored on the history
list
"  call Decho("(user: <u>) chg to prev dir from history")
let g:netrw_dirhist_cnt= ( g:netrw_dirhist_cnt - 1 ) % g:netrw_dirhistmax
if g:netrw_dirhist_cnt < 0
  let g:netrw_dirhist_cnt= g:netrw_dirhist_cnt + g:netrw_dirhistmax
endif
if exists("g:netrw_dirhist_{g:netrw_dirhist_cnt}")
"  call Decho("changedir u#" .g:netrw_dirhist_cnt.<" .g:netrw_dirhist_{g:netrw_dirhist_cnt}.>")
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && exists("b:netrw_curdir")
  setlocal ma noro
"  call Decho("setlocal ma noro")
  %d
  setlocal nomod
"  call Decho("setlocal nomod")
endif
"  "  call Decho("exe e! ".fnameescape(g:netrw_dirhist_{g:netrw_dirhist_cnt}))
exe "e! ".fnameescape(g:netrw_dirhist_{g:netrw_dirhist_cnt})
else
  let g:netrw_dirhist_cnt= ( g:netrw_dirhist_cnt + 1 ) % g:netrw_dirhistmax
  echo "Sorry, no predecessor directory exists yet"
endif

```

```

elseif a:chg == 5
" U: change to the
subsequent directory stored on the history list
" call Decho("(user: <U>) chg to next dir from history")
let g:netrw_dirhist_cnt= ( g:netrw_dirhist_cnt + 1 ) % g:netrw_dirhistmax
if exists("g:netrw_dirhist_{g:netrw_dirhist_cnt}")
" call Decho("changedir U#".g:netrw_dirhist_cnt."<".g:netrw_dirhist_{g:netrw_dirhist_cnt}.">")
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && exists("b:netrw_curdir")
setlocal ma noro
" call Decho("setlocal ma noro")
%d
" call Decho("removed all lines from buffer (%d)")
setlocal nomod
" call Decho("setlocal nomod")
endif
" call Decho("exe e! ".fnameescape(g:netrw_dirhist_{g:netrw_dirhist_cnt}))
exe "e! ".fnameescape(g:netrw_dirhist_{g:netrw_dirhist_cnt})
else
let g:netrw_dirhist_cnt= ( g:netrw_dirhist_cnt - 1 ) % g:netrw_dirhistmax
if g:netrw_dirhist_cnt < 0
let g:netrw_dirhist_cnt= g:netrw_dirhist_cnt + g:netrw_dirhistmax
endif
echo "Sorry,
no successor directory exists yet"
endif

elseif a:chg == 6
" delete the v:count'th bookmark
" call Decho("delete bookmark#".v:count."<".g:netrw_bookmarklist[v:count-1].">")
let savefile= s:NetrwHome()."/.netrwbook"
if filereadable(savefile)
call s:NetrwBookHistSave() " done here to merge bookmarks first
call delete(savefile)
endif
call remove(g:netrw_bookmarklist,v:count-1)
endif
call s:NetrwBookmarkMenu()
" call Dret("NetrwBookHistHandler")
endfun

" -----
" s:NetrwBookHistRead: this function reads bookmarks and history {{{2
"         Sister function: s:NetrwBookHistSave()
fun! s:NetrwBookHistRead()
" call Dfunc("s:NetrwBookHistRead()")
if !exists("s:netrw_initbookhist")
let savefile= s:NetrwHome()."/.netrwbook"

```



```

if filereadable(savefile)
" call Decho("sourcing .netrwbook")
  exe "so ".savefile
endif
let savefile= s:NetrwHome()."/.netrwhist"
if filereadable(savefile)
" call Decho("sourcing .netrwhist")
  exe "so ".savefile
endif
let s:netrw_initbookhist= 1
au VimLeave * call s:NetrwBookHistSave()
endif
" call Dret("s:NetrwBookHistRead")
endfun

" -----
" s:NetrwBookHistSave: this function saves bookmarks and history {{{2
"       Sister function: s:NetrwBookHistRead()
"       I used to do this via viminfo but that appears to
"       be unreliable for long-term storage
"       COMBAK: does $HOME work under windows???
fun! s:NetrwBookHistSave()
" call Dfunc("s:NetrwBookHistSave() dirhistmax=".g:netrw_dirhistmax)
let savefile= s:NetrwHome()."/.netrwhist"
lsplit
enew
setlocal noswf

" save .netrwhist -- no attempt to merge
file .netrwhist
call setline(1,"let g:netrw_dirhistmax =" .g:netrw_dirhistmax)
call setline(2,"let g:netrw_dirhist_cnt
=" .g:netrw_dirhist_cnt)
let lastline = line("$")
let cnt    = 1
while cnt <= g:netrw_dirhist_cnt
  call setline((cnt+lastline),'let g:netrw_dirhist_'.cnt."=" .g:netrw_dirhist_{cnt}. ""')
  let cnt= cnt + 1
endwhile
exe "silent! w! ".savefile
%d

if exists("g:netrw_bookmarklist") && g:netrw_bookmarklist != []
" merge and write .netrwbook
let savefile= s:NetrwHome()."/.netrwbook"

if filereadable(savefile)
  let booklist= deepcopy(g:netrw_bookmarklist)

```

```

exe "silent so ".savefile
for bdm in booklist
  if index(g:netrw_bookmarklist,bdm) == -1
    call add(g:netrw_bookmarklist,bdm)
  endif
endfor
call sort(g:netrw_bookmarklist)
exe "silent! w! ".savefile
endif

" construct and save .netrwbook
call setline(1,"let g:netrw_bookmarklist= ".string(g:netrw_bookmarklist))
exe "silent! w! ".savefile
endif
let bgone= bufnr("%")
q!
exe bgone."bwipe!"

" call Dret("s:NetrwBookHistSave")
endfun

"
-----
" s:NetrwBrowse: This function uses the command in g:netrw_list_cmd to provide a {{{2
" list of the contents of a local or remote directory. It is assumed that the
" g:netrw_list_cmd has a string, USEPORT HOSTNAME, that needs to be substituted
" with the requested remote hostname first.
fun! s:NetrwBrowse(islocal,dirname)
  if !exists("w:netrw_liststyle")|let w:netrw_liststyle= g:netrw_liststyle|endif
  " call Dfunc("s:NetrwBrowse(islocal=".a:islocal." dirname<".a:dirname.">) liststyle=".w:netrw_liststyle."
  ".g:loaded_netrw." buf#" .bufnr("%")."<".bufname("%").">")
  " call Decho("tab#" .tabpagenr()." win#" .winnr())
  " call Dredir("ls!")
  if !exists("s:netrw_initbookhist")
    call s:NetrwBookHistRead()
  endif

  if exists("s:netrw_skipbrowse")
    unlet s:netrw_skipbrowse
  " call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
  " call Dret("s:NetrwBrowse : s:netrw_skipbrowse=" .s:netrw_skipbrowse)
  return
  endif
  if !exists("shellescape")
    call netrw#ErrorMsg(s:ERROR,"netrw can't run -- your vim is missing shellescape()",69)
  " call Dret("s:NetrwBrowse : missing shellescape()")
  return
  endif
endfun

```

```

if !exists("*fnameescape")
  call netrw#ErrorMsg(s:ERROR,"netrw can't run -- your vim is missing fnameescape()",70)
"  call Dret("s:NetrwBrowse : missing fnameescape()")
  return
endif

call s:NetrwOptionSave("w:")
call s:NetrwSafeOptions()

" re-instate any marked files
if exists("s:netrwmarkfilelist_{bufnr('%')}")
"  call Decho("clearing marked files")
  exe "2match netrwMarkFile /".s:netrwmarkfilemtch_{bufnr("%")}. "/"
endif

if a:islocal && exists("w:netrw_acdkeep") && w:netrw_acdkeep
"  call Decho("handle w:netrw_acdkeep:")
"  call Decho("keepjumps lcd '.fnameescape(a:dirname)." (due to w:netrw_acdkeep="w:netrw_acdkeep." -
acd=".&acd.")")
  exe 'keepjumps lcd '.fnameescape(a:dirname)
"  call
Decho("getcwd<".getcwd().">")

elseif !a:islocal && a:dirname !~ '[V]$\$' && a:dirname !~ '^"'
" looks like a regular file, attempt transfer
"  call Decho("attempt transfer as regular file<".a:dirname.">")

" remove any filetype indicator from end of dirname, except for the {{{3
" "this is a directory" indicator (/).
" There shouldn't be one of those here, anyway.
let path= substitute(a:dirname,['*=@]|\r\=$',' ','e')
"  call Decho("new path<".path.">")
call s:RemotePathAnalysis(a:dirname)

" remote-read the requested file into current buffer {{{3
mark '
call s:NetrwEnew(a:dirname)
setlocal ma noro
"  call Decho("setlocal ma noro")
let b:netrw_curdir= a:dirname
"  call Decho("exe silent! keepalt file ".fnameescape(s:method."/".s:user.s:machine."/".s:path)." (bt=".&bt.")")
exe "silent! keepalt file ".fnameescape(s:method."/".s:user.s:machine."/".s:path)
exe "silent keepalt doau BufReadPre ".fnameescape(s:fname)
silent
call netrw#NetRead(2,s:method."/".s:user.s:machine."/".s:path)
if s:path !~ '.tar.bz2\$' && s:path !~ '.tar.gz'
" netrw.vim and tar.vim have already handled decompression of the tarball; avoiding gzip.vim error
exe "silent keepalt doau BufReadPost ".fnameescape(s:fname)

```

```

endif

" save certain window-oriented variables into buffer-oriented variables {{{3
call s:SetBufWinVars()
call s:NetrwOptionRestore("w:")
setlocal ma nomod

" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:NetrwBrowse : file<".s:fname.">")
return
endif

" use buffer-oriented WinVars if buffer ones exist but window ones don't {{{3
call s:UseBufWinVars()

" set up some variables {{{3
let b:netrw_browser_active = 1
let dirname          = a:dirname
let s:last_sort_by   = g:netrw_sort_by

" set up menu {{{3
call s:NetrwMenu(1)

" set up buffer {{{3
let reusing= s:NetrwGetBuffer(a:islocal,dirname)
" maintain markfile highlighting
if exists("s:netrwmarkfilemtch_{bufnr('%')}") && s:netrwmarkfilemtch_{bufnr("%")} != ""
" call Decho("bufnr(%)"= ".bufnr('%')")
" call Decho("exe 2match netrwMarkFile /".s:netrwmarkfilemtch_{bufnr("%")}."/")
exe "2match netrwMarkFile /".s:netrwmarkfilemtch_{bufnr("%")}."/")
else
" call Decho("2match none")
2match none
endif
if reusing
call s:NetrwOptionRestore("w:")
setlocal noma nomod nowrap
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:NetrwBrowse : re-using buffer")
return
endif

" set b:netrw_curdir to the new directory name {{{3
" call Decho("set b:netrw_curdir to the new directory name:")
let b:netrw_curdir= dirname
if b:netrw_curdir =~ '[\\\]'$
let b:netrw_curdir= substitute(b:netrw_curdir,'[\\\]$',','e')
endif

```

```

if b:netrw_curdir == "
  if has("amiga")
    " On the Amiga, the empty string connotes the current directory

let b:netrw_curdir= getcwd()
else
  " under unix, when the root directory is encountered, the result
  " from the preceding substitute is an empty string.
  let b:netrw_curdir= '/'
endif
endif
if !a:islocal && b:netrw_curdir !~ '/'$
  let b:netrw_curdir= b:netrw_curdir.'/'
endif
" call Decho("b:netrw_curdir<" .b:netrw_curdir.">")

" -----
" (local only) {{{3
" -----
if a:islocal
" call Decho("local only:")

" Set up ShellCmdPost handling. Append current buffer to browselist
call s:LocalFastBrowser()

" handle g:netrw_keepdir: set vim's current directory to netrw's notion of the current directory {{{3
if !g:netrw_keepdir
" call Decho("handle g:netrw_keepdir=" .g:netrw_keepdir.": getcwd<".getcwd()."> acd=".&acd)
" call Decho("l:acd".(exists("&l:acd")? "=".&l:acd : " doesn't exist"))
if !exists("&l:acd") || !&l:acd
" call Decho('exe keepjumps lcd '.fnameescape(b:netrw_curdir))
try
  exe
'keepjumps lcd '.fnameescape(b:netrw_curdir)
catch /^Vim\%((\a\+)\)=:E472/
  call netrw#ErrorMsg(s:ERROR,"unable to change directory to <" .b:netrw_curdir."> (permissions?)",61)
  if exists("w:netrw_prvdir")
    let b:netrw_curdir= w:netrw_prvdir
  else
    call s:NetrwOptionRestore("w:")
    setlocal noma nomod nowrap
    let b:netrw_curdir= dirname
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:NetrwBrowse : reusing buffer#".(exists("bufnum")? bufnum : 'N/A')." <".dirname.">
getcwd<".getcwd().">")
  return
endif
endtry

```

```

endif
endif

" -----
" remote handling: {{{3
" -----
else
" call Decho("remote only:")

" analyze a:dirname and g:netrw_list_cmd {{{4
" call Decho("b:netrw_curdir<".(exists("b:netrw_curdir")? b:netrw_curdir : "doesn't exist").">
a:dirname<".a:dirname.">")
if a:dirname =~
"^NetrwTreeListing\>"
let dirname= b:netrw_curdir
" call Decho("(dirname was ".a:dirname.") dirname<".dirname.">")
elseif exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && exists("b:netrw_curdir")
let dirname= substitute(b:netrw_curdir, '\\', '/', 'g')
if dirname !~ '/'$'
let dirname= dirname.'/'
endif
let b:netrw_curdir = dirname
" call Decho("(liststyle is TREELIST) dirname<".dirname.">")
else
let dirname = substitute(a:dirname, '\\', '/', 'g')
" call Decho("(normal) dirname<".dirname.">")
endif

let dirpat = '^(\w\{-}\):/\w\{+}@)=\([^/]\+\)\(.*\)$'
if dirname !~ dirpat
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR, "netrw doesn't understand your dirname<".dirname.">", 20)
endif
call s:NetrwOptionRestore("w:")
setlocal noma nomod nowrap
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:NetrwBrowse : badly formatted dirname<".dirname.">")
return
endif
let b:netrw_curdir= dirname
" call Decho("b:netrw_curdir<".b:netrw_curdir."> (remote)")
endif " (additional remote handling)

" -----
" Directory Listing: {{{3
" -----
call s:BrowserMaps(a:islocal)
call s:PerformListing(a:islocal)

```

```

" The s:LocalBrowseShellCmdRefresh() function is called by an autocmd
" installed by s:LocalFastBrowser() when g:netrw_fastbrowse <= 1 (ie. slow, medium speed).
" However, s:NetrwBrowse() causes the ShellCmdPost event itself to fire once; setting
" the variable below avoids that second refresh of the screen. The s:LocalBrowseShellCmdRefresh()
" function gets called due to that autocmd; it notices that the following variable is set
" and skips the refresh and sets s:locbrowseshellcmd to zero. Oct 13, 2008
let s:locbrowseshellcmd= 1

```

```

" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:NetrwBrowse : did
PerformListing")
return
endfun

```

```

" -----
" s:NetrwFileInfo: supports qf (query for file information) {{{2
fun! s:NetrwFileInfo(islocal,fname)
" call Dfunc("s:NetrwFileInfo(islocal=".a:islocal." fname<".a:fname.">")
if a:islocal
if (has("unix") || has("macunix")) && executable("/bin/lis")
if exists("b:netrw_curdir")
" call Decho('using ls with b:netrw_curdir<'.b:netrw_curdir.>')
if b:netrw_curdir =~ '/'$
echo system("/bin/lis -lsad ".shellescape(b:netrw_curdir.a:fname))
else
echo system("/bin/lis -lsad ".shellescape(b:netrw_curdir."/".a:fname))
endif
else
" call Decho('using ls '.a:fname." using cwd<".getcwd().">")
echo system("/bin/lis -lsad ".shellescape(a:fname))
endif
else
" use vim functions to return information about file below cursor
" call Decho("using vim functions to query for file info")
if !isdirectory(a:fname) && !filereadable(a:fname)
&& a:fname =~ '.*@/'
let fname= substitute(a:fname,".$","","")
else
let fname= a:fname
endif
let t = getftime(fname)
let sz = getfsize(fname)
echo a:fname.: ".sz." ".strftime(g:netrw_timefmt,getftime(fname))
" call Decho(fname.: ".sz." ".strftime(g:netrw_timefmt,getftime(fname)))
endif
else
echo "sorry, \"qf\" not supported yet for remote files"

```

```

endif
" call Dret("s:NetrwFileInfo")
endfun

" -----
" s:NetrwGetBuffer: {{{2
" returns 0=cleared buffer
"      1=re-used buffer
fun! s:NetrwGetBuffer(islocal,dirname)
" call Dfunc("s:NetrwGetBuffer(islocal=".a:islocal." dirname<".a:dirname.">) liststyle=".g:netrw_liststyle)
let dirname= a:dirname

" re-use buffer if possible {{{3
" call Decho("--re-use a buffer if possible--")
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST
" find NetrwTreeList buffer
if there is one
if exists("w:netrw_treebufnr") && w:netrw_treebufnr > 0
" call Decho(" re-use w:netrw_treebufnr=".w:netrw_treebufnr)
let eikeep= &ei
set ei=all
exe "b ".w:netrw_treebufnr
let &ei= eikeep
" call Dret("s:NetrwGetBuffer : bufnum#".w:netrw_treebufnr."<NetrwTreeListing>")
return
endif
let bufnum= -1
" call Decho(" liststyle=TREE but w:netrw_treebufnr doesn't exist")

else
" find buffer number of buffer named precisely the same as dirname {{{3
" call Decho("--find buffer numnber of buffer named precisely the same as dirname--")
" call Dredir("ls!")

" get dirname and associated buffer number
let bufnum = bufnr(escape(dirname,'\'))
" call Decho(" find buffer<".dirname.">'s number ")
" call Decho(" bufnr(dirname<".escape(dirname,'\').">)"=".bufnum)

if bufnum < 0 && dirname !~ '/'$
" trying appending a trailing /
" call Decho(" try appending a trailing / to dirname<".dirname.">")
let bufnum= bufnr(escape(dirname.'/','\'))
if bufnum > 0
let dirname= dirname.'/'
endif
endif
endif

```



```

if bufnum < 0 && dirname =~ '/'$'
  " trying removing a trailing /
" call Decho(" try removing a trailing / from dirname<".dirname.">")
let bufnum= bufnr(escape(substitute(dirname,'/','$',''),'\'))
if bufnum > 0
  let dirname= substitute(dirname,'/','$','')
endif
endif

" call Decho(" findbuf1: bufnum=bufnr("".dirname."")=".bufnum." bufname("".bufnum."<".bufname(bufnum).">
(initial)")
" note: !~ was used just below, but that means using ../ to go back would match (ie. abc/def/ and abc/ matches)
if bufnum > 0 && bufname(bufnum) != dirname && bufname(bufnum) != '.'
  " handle approximate matches
" call Decho(" handling approx match: bufnum#%d<".bufname(bufnum)."> approx=dirname<".dirname.">")
let ibuf = 1
let buflast = bufnr("$")
" call Decho(" findbuf2: buflast=".buflast)
while ibuf <= buflast
  let bname= substitute(bufname(ibuf),'\./','g')
  let bname= substitute(bname,'\zs/$','')
" call Decho(" findbuf3: dirname<".dirname."> bufname("".ibuf."")<".bname.">")
if bname != " && dirname =~ '/'.bname.'\^=$' | break | endif
if bname =~ '^'.dirname.'\^=$' | break | endif
if dirname =~ '^'.bname.'/$' | break | endif
let ibuf= ibuf + 1
endwhile
if ibuf > buflast
  let bufnum= -1
else
  let bufnum= ibuf
endif
" call Decho(" findbuf4: bufnum="".bufnum." (ibuf="".ibuf." buflast="".buflast."")
endif
endif

" get anew buffer and name it -or- re-use buffer {{{3
" call Decho("--get anew buffer and name it OR re-use buffer-- (bufnum="".bufnum."")")
mark '
if bufnum < 0 || !bufexists(bufnum)
  call s:NetrwEnew(dirname)
" call Decho(" got anew buffer#".bufnr("%")." (altbuf<".expand("#").">")
" name the buffer
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST
  " Got anew buffer; transform into a NetrwTreeListing
" call Decho("--transform anew buffer#".bufnr("%")." into a NetrwTreeListing --")
if !exists("s:netrw_treelistnum")
  let s:netrw_treelistnum= 1

```

```

else
  let s:netrw_treelistnum= s:netrw_treelistnum + 1
endif
let w:netrw_treebufnr= bufnr("% ")
" call Decho(" exe silent! keepalt file NetrwTreeListing ".fnameescape(s:netrw_treelistnum))
exe 'silent! keepalt file NetrwTreeListing\' '.fnameescape(s:netrw_treelistnum)
nnoremap <silent> <buffer> [ :silent call <SID>TreeListMove(['<cr>
nnoremap <silent> <buffer> ] :silent call <SID>TreeListMove(']')<cr>
nnoremap <silent> <buffer> [[ :silent call <SID>TreeListMove(['<cr>
nnoremap <silent> <buffer> ]] :silent call <SID>TreeListMove(']')<cr>
" call Decho(" tree listing#".s:netrw_treelistnum." bufnr=".w:netrw_treebufnr)
else
" let v:errmsg= "" " Decho
let escdirname= fnameescape(dirname)
" call
Decho(" errmsg<".v:errmsg."> bufnr(".escdirname.)=".bufnr(escdirname)."<".bufname(bufnr(escdirname)).">")
" call Decho(' exe silent! keepalt file '.escdirname)
exe 'silent! keepalt file '.escdirname
" call Decho(" errmsg<".v:errmsg.">
bufnr(".escdirname.)=".bufnr(escdirname)."<".bufname(bufnr(escdirname)).">")
endif
" call Decho(" named anew buffer#".bufnr("% ")."<".bufname("% ").">")

else " Re-use the buffer
" call Decho("--re-use buffer#".bufnum." : --")
let eikp= &ei
set ei=all
if getline(2) =~ '^" Netrw Directory Listing'
" call Decho(" re-use buffer#".bufnum."<".((bufnum > 0)? bufname(bufnum) : "")."> using: keepalt b ".bufnum)
exe "keepalt b ".bufnum
else
" call Decho(" reusing buffer#".bufnum."<".((bufnum > 0)? bufname(bufnum) : "")."> using: b ".bufnum)
exe "b ".bufnum
endif
if bufname("%") == ' '
" call Decho("exe silent! keepalt file ".fnameescape(getcwd()))
exe "silent! keepalt file ".fnameescape(getcwd())
endif
let &ei= eikp
if line("$") <= 1
call s:NetrwListSettings(a:islocal)
" call Dret("s:NetrwGetBuffer 0 : re-using buffer#".bufnr("% ").", but its empty, so refresh it")
return 0
elseif exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST
" call Decho("--re-use tree listing--")
" call Decho(" clear buffer<".expand("% ")."> with :%d")
silent %d
call s:NetrwListSettings(a:islocal)

```

```

" call Dret("s:NetrwGetBuffer 0 : re-using buffer#.bufnr("%").", but treelist mode always needs a refresh")
return 0
else
" call Dret("s:NetrwGetBuffer 1 : buf#.bufnr("%"))
return 1
endif
endif

" do netrw settings: make this buffer not-a-file, modifiable, not line-numbered, etc {{{3
" fastbrowse Local Remote Hiding a buffer implies it may be re-used (fast)
" slow 0 D D Deleting a buffer implies it will not be re-used (slow)
" med 1 D H
"
fast 2 H H
" call Decho("--do netrw settings: make this buffer not-a-file, modifiable, not line-numbered, etc--")
let fname= expand("%")
call s:NetrwListSettings(a:islocal)
" call Decho("exe keepalt file ".fnameescape(fname))
exe "keepalt file ".fnameescape(fname)

" delete all lines from buffer {{{3
" call Decho("--delete all lines from buffer--")
" call Decho(" clear buffer<".expand("%")."> with :%d")
keepalt silent! %d

" call Dret("s:NetrwGetBuffer 0 : buf#.bufnr("%"))
return 0
endfun

" -----
" s:NetrwGetcwd: get the current directory. {{{2
" Change backslashes to forward slashes, if any.
" If doesc is true, escape certain troublesome characters
fun! s:NetrwGetcwd(doesc)
" call Dfunc("NetrwGetcwd(doesc=".a:doesc.")")
let curdir= substitute(getcwd(),"\\','', 'ge')
if curdir !~ '[\V]$\$'
let curdir= curdir.'/'
endif
if a:doesc
let curdir= fnameescape(curdir)
endif
" call Dret("NetrwGetcwd <".curdir.">")
return curdir
endfun

" -----
" s:NetrwGetWord: it gets the directory/file named under the cursor {{{2

```

```

fun! s:NetrwGetWord()
" call Dfunc("s:NetrwGetWord() line#".line(".").".liststyle=".g:netrw_liststyle." virtcol=".virtcol("."))
call s:UseBufWinVars()

" insure that w:netrw_liststyle is set up
if !exists("w:netrw_liststyle")
if exists("g:netrw_liststyle")
let w:netrw_liststyle= g:netrw_liststyle
else
let w:netrw_liststyle= s:THINLIST
endif
" call Decho("w:netrw_liststyle=".w:netrw_liststyle)
endif

if exists("w:netrw_bannercnt") && line(".") < w:netrw_bannercnt
" Active Banner support
" call Decho("active banner handling")
norm! 0
let dirname= "./"
let curline= getline('.')

if curline =~ ""\s*Sorted by\s'
norm s
let s:netrw_skipbrowse= 1
echo 'Pressing "s" also works'

elseif curline =~ ""\s*Sort sequence:'
let s:netrw_skipbrowse= 1
echo 'Press "S" to edit sorting sequence'

elseif curline =~ ""\s*Quick Help:'
norm ?
let s:netrw_skipbrowse= 1
echo 'Pressing "?" also works'

elseif curline =~ ""\s*\%(Hiding\|Showing\):'
norm a
let s:netrw_skipbrowse= 1
echo 'Pressing "a" also works'

elseif line("$") > w:netrw_bannercnt
exe 'silent keepjumps '.w:netrw_bannercnt
endif

elseif w:netrw_liststyle == s:THINLIST
" call Decho("thin column handling")
norm! 0
let dirname= getline('.')

```

```

elseif w:netrw_liststyle == s:LONGLIST
" call Decho("long column handling")
norm! 0
let dirname= substitute(getline('.'),'^\(\%(\|S+ \|)*\|S+\|)\.\{-\}$',\1',e')

elseif w:netrw_liststyle == s:TREELIST
" call Decho("treelist handling")
let dirname= substitute(getline('.'),'^\(| \|)*',",e')

else
" call Decho("obtain word from wide listing")
let dirname= getline('.')

if !exists("b:netrw_cpf")
let b:netrw_cpf= 0
exe 'silent keepjumps '.w:netrw_bannercnt.',$g/^./if virtcol("$") > b:netrw_cpf|let b:netrw_cpf= virtcol("$)|endif'
" call Decho("computed cpf=".b:netrw_cpf)
endif

" call Decho("buf#".bufnr("%")."<".bufname("%").">")
let filestart = (virtcol(".")/b:netrw_cpf)*b:netrw_cpf
" call Decho("filestart= ([virtcol=".virtcol(".")."]/[b:netrw_cpf=".b:netrw_cpf."])*b:netrw_cpf=".filestart."
bannercnt=".w:netrw_bannercnt)
" call Decho("1: dirname<".dirname.">")
if filestart == 0
norm! 0ma
else
call cursor(line("."),filestart+1)
norm! ma
endif
let rega= @a
let eofname= filestart + b:netrw_cpf + 1
if eofname <= col("$")
call cursor(line("."),filestart+b:netrw_cpf+1)
norm! "ay'a
else
norm! "ay$
endif
let dirname = @a
let @a = rega
" call Decho("2: dirname<".dirname.">")
let dirname= substitute(dirname,\s+$/,',e')
" call
Decho("3: dirname<".dirname.">")
endif

" symlinks are indicated by a trailing "@". Remove it before further processing.

```

```

let dirname= substitute(dirname,"@$", "", "")

" executables are indicated by a trailing "*". Remove it before further processing.
let dirname= substitute(dirname,"\\*$", "", "")

" call Dret("s:NetrwGetWord <".dirname.">")
return dirname
endfun

" -----
" s:NetrwListSettings: {{{2
fun! s:NetrwListSettings(islocal)
" call Dfunc("s:NetrwListSettings(islocal=".a:islocal.")")
let fname= bufname("%")
" call Decho("setlocal bt=nofile nobl ma nonu nowrap noro")
setlocal bt=nofile nobl ma nonu nowrap noro
" call Decho("exe keepalt file ".fnameescape(fname))
exe "keepalt file ".fnameescape(fname)
if g:netrw_use_noswf
setlocal noswf
endif
" call Dredir("ls!")
" call Decho("exe setlocal ts=".g:netrw_maxfilenamelen)
exe "setlocal ts=".g:netrw_maxfilenamelen
setlocal isk+=.,~, -
if g:netrw_fastbrowse > a:islocal
setlocal bh=hide
else
setlocal bh=delete
endif
" call Dret("s:NetrwListSettings")
endfun

" -----
" s:NetrwListStyle: {{{2
" islocal=0: remote browsing
"   =1: local browsing
fun! s:NetrwListStyle(islocal)
" call Dfunc("NetrwListStyle(islocal=".a:islocal.") w:netrw_liststyle=".w:netrw_liststyle)
let fname      = s:NetrwGetWord()
if !exists("w:netrw_liststyle")|let w:netrw_liststyle= g:netrw_liststyle|endif
let w:netrw_liststyle = (w:netrw_liststyle + 1) % s:MAXLIST
" call Decho("fname<".fname.">")
" call Decho("chgd w:netrw_liststyle to ".w:netrw_liststyle)
" call Decho("b:netrw_curdir<".(exists("b:netrw_curdir"))? b:netrw_curdir : "doesn't exist").">")

if w:netrw_liststyle == s:THINLIST
" use one column listing

```

```

" call Decho("use one column list")
let g:netrw_list_cmd = substitute(g:netrw_list_cmd,'
-l','ge')

elseif w:netrw_liststyle == s:LONGLIST
" use long list
" call Decho("use long list")
let g:netrw_list_cmd = g:netrw_list_cmd." -l"

elseif w:netrw_liststyle == s:WIDELIST
" give wide list
" call Decho("use wide list")
let g:netrw_list_cmd = substitute(g:netrw_list_cmd,' -l','ge')

elseif w:netrw_liststyle == s:TREELIST
" call Decho("use tree list")
let g:netrw_list_cmd = substitute(g:netrw_list_cmd,' -l','ge')

else
call netrw#ErrorMsg(s:WARNING,"bad value for g:netrw_liststyle (=".w:netrw_liststyle.")",46)
let g:netrw_liststyle = s:THINLIST
let w:netrw_liststyle = g:netrw_liststyle
let g:netrw_list_cmd = substitute(g:netrw_list_cmd,' -l','ge')
endif
setlocal ma noro
" call Decho("setlocal ma noro")

" clear buffer - this will cause NetrwBrowse/LocalBrowseCheck to do a refresh
" call Decho("clear buffer<".expand("%")."> with :%d")
%d

" refresh the listing
let svpos= netrw#NetrwSavePosn()
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'/'))
call netrw#NetrwRestorePosn(svpos)
if w:netrw_liststyle != s:WIDELIST
if g:netrw_cursorline == 2
setlocal cursorline
let &cursorcolumn= s:netrw_usercuc
elseif g:netrw_cursorline
setlocal cursorline
" call Decho("setlocal cursorline")
endif
else
if g:netrw_cursorline == 2
setlocal cursorline cursorcolumn
" call Decho("setlocal cursorline cursorcolumn")
elseif g:netrw_cursorline

```

```

let &cursorline= s:netrw_usercul
endif
endif

" keep cursor on the filename
silent keepjumps $
let result= search("\%(\%(|+|s|)\)=|s\{2,}\)\zs'.escape(fname,'.[]*$^').\%(s\{2,}\|$\)','bc')
" call Decho("search result=".result." w:netrw_bannercnt="(exists("w:netrw_bannercnt")? w:netrw_bannercnt :
'N/A'))
if result <= 0 && exists("w:netrw_bannercnt")
exe "keepjumps ".w:netrw_bannercnt
endif

" call Dret("NetrwListStyle".(exists("w:netrw_liststyle")?
': w:netrw_liststyle='.w:netrw_liststyle : ""))
endfun

" -----
" s:NetrwBookmarkMenu: Uses menu priorities {{{2
"         .2.[cnt] for bookmarks, and
"         .3.[cnt] for history
"         (see s:NetrwMenu())
fun! s:NetrwBookmarkMenu()
if !exists("s:netrw_menucnt")
return
endif
" call Dfunc("NetrwBookmarkMenu() histcnt=".g:netrw_dirhist_cnt." menucnt=".s:netrw_menucnt)

" the following test assures that gvim is running, has menus available, and has menus enabled.
if has("gui") && has("menu") && has("gui_running") && &go =~ 'm' && g:netrw_menu
if exists("g:NetrwTopLvlMenu")
" call Decho("removing ".g:NetrwTopLvlMenu.'Bookmarks menu item(s)')
exe 'silent! unmenu '.g:NetrwTopLvlMenu.'Bookmarks'
exe 'silent! unmenu '.g:NetrwTopLvlMenu.'Bookmarks\ and\ History.Bookmark\ Delete'
endif
if !exists("s:netrw_initbookhist")
call s:NetrwBookHistRead()
endif

" show bookmarked places
if exists("g:netrw_bookmarklist") && g:netrw_bookmarklist != []
let cnt= 1
for bmd in g:netrw_bookmarklist
" call Decho('silent! menu '.g:NetrwMenuPriority.'.2.'.cnt." ".g:NetrwTopLvlMenu.'Bookmark.'.bmd.' :e '.bmd)
let bmd= escape(bmd,' ')

" show bookmarks for goto menu
exe 'silent! menu '.g:NetrwMenuPriority.'.2.'.cnt." ".g:NetrwTopLvlMenu.'Bookmarks.'.bmd.' :e '.bmd."<cr>"

```



```

" show bookmarks for deletion menu
exe 'silent! menu '.g:NetrwMenuPriority.".8.2.".cnt.'" ".g:NetrwTopLvlMenu.'Bookmarks\ and\
History.Bookmark\ Delete.'.bmd.'.cnt.'"mB"
  let cnt= cnt + 1
endfor

endif

" show directory browsing history
let cnt = g:netrw_dirhist_cnt
let first = 1
let histcnt = 0
while ( first || cnt != g:netrw_dirhist_cnt )
  let histcnt = histcnt + 1
  let priority = g:netrw_dirhist_cnt + histcnt
  if exists("g:netrw_dirhist_{cnt}")
    let histdir= escape(g:netrw_dirhist_{cnt},'./&? ')
"   call Decho('silent! menu '.g:NetrwMenuPriority.".3.".priority.'" ".g:NetrwTopLvlMenu.'History.'.histdir.' :e
'.histdir)
    exe 'silent! menu '.g:NetrwMenuPriority.".3.".priority.'" ".g:NetrwTopLvlMenu.'History.'.histdir.' :e
'.histdir.'"<cr>'
  endif
  let first = 0
  let cnt = ( cnt - 1 ) % g:netrw_dirhistmax
  if cnt < 0
    let cnt= cnt + g:netrw_dirhistmax
  endif
endwhile

endif
" call Dret("NetrwBookmarkMenu")
endfun

" -----
" s:NetrwBrowseChgDir: constructs a new directory based on the current {{{2
"       directory and a new directory name. Also, if the
"       "new directory name" is actually a file,
"       NetrwBrowseChgDir() edits the file.
fun! s:NetrwBrowseChgDir(islocal,newdir,...)
" call Dfunc("s:NetrwBrowseChgDir(islocal=".a:islocal.">
newdir<"a:newdir.">) a:0="a:0." curpos<".string(getpos("."))"> b:netrw_curdir<".(exists("b:netrw_curdir"))?
b:netrw_curdir : "".">")

if !exists("b:netrw_curdir")
" Don't try to change-directory: this can happen, for example, when netrw#ErrorMsg has been called
" and the current window is the NetrwMessage window.
" call Decho("(NetrwBrowseChgDir) b:netrw_curdir doesn't exist!")

```

```

" call Decho("getcwd<"getcwd().">")
" call Dredir("ls!")
" call Dret("s:NetrwBrowseChgDir")
return
endif

call s:NetrwOptionSave("s:")
call s:NetrwSafeOptions()
let nbcd_curpos          = netrw#NetrwSavePosn()
let s:nbcd_curpos_{bufnr('%')} = nbcd_curpos
let dirname              = substitute(b:netrw_curdir, '\\', '/', 'ge')
let newdir               = a:newdir
let dolockout            = 0

" set up o/s-dependent directory recognition pattern
if has("amiga")
let dirpat= '[\V:~]$\n'
else
let dirpat= '[\V]$\n'
endif
" call
Decho("dirname<".dirname."> dirpat<".dirpat.">")

if dirname !~ dirpat
" apparently vim is "recognizing" that it is in a directory and
" is removing the trailing "/". Bad idea, so I put it back.
let dirname= dirname.'/\n'
" call Decho("adjusting dirname<".dirname.">")
endif

if newdir !~ dirpat
" -----
" edit a file:
" -----
" call Decho('case "handling a file": newdir<'.newdir.> !~ dirpat<'.dirpat.>')
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && exists("w:netrw_treedict") && newdir !~
'^\(\(\|a:\)\n'
let dirname= s:NetrwTreeDir()
if dirname =~ '/$'
let dirname= dirname.newdir
else
let dirname= s:NetrwTreeDir()."/".newdir
endif
" call Decho("tree listing")
elseif newdir =~ '^(\(\|a:\)\n'
let dirname= newdir
else
let dirname= s:ComposePath(dirname,newdir)

```

```

endif
" call Decho("handling a file: dirname<".dirname."> (a:0=".a:0.")")
" this lets
NetrwBrowseX avoid the edit
if a:0 < 1
" call Decho("set up windows for editing<".fnameescape(dirname)."> didsplit=".exists("s:didsplit")? s:didsplit :
"doesn't exist")
call s:NetrwOptionRestore("s:")
if !exists("s:didsplit")
if g:netrw_browse_split == 1
new
wincmd _
elseif g:netrw_browse_split == 2
rightb vert new
wincmd |
elseif g:netrw_browse_split == 3
tabnew
elseif g:netrw_browse_split == 4
if s:NetrwPrevWinOpen(2) == 3
" call Dret("s:NetrwBrowseChgDir")
return
endif
else
" handling a file, didn't split, so remove menu
" call Decho("handling a file+didn't split, so remove menu")
call s:NetrwMenu(0)
" optional change to window
if g:netrw_chgwin >= 1
exe "keepjumps ".g:netrw_chgwin."wincmd w"
endif
endif
endif
" the point where netrw actually edits the (local) file
" if its local only: LocalBrowseCheck()
doesn't edit a file, but NetrwBrowse() will
if a:islocal
" call Decho("edit local file: exe e! ".fnameescape(dirname))
exe "e! ".fnameescape(dirname)
else
" call Decho("remote file: NetrwBrowse will edit it")
endif
let dolockout= 1
endif

elseif newdir =~ '^/'
" -----
" just go to the new directory spec
" -----

```

```

" call Decho('case "just go to new directory spec": newdir<'.newdir.>')
let dirname= newdir
call s:SetRexDir(a:islocal,dirname)
call s:NetrwOptionRestore("s:")

elseif newdir == './'
" -----
" refresh the directory list
" -----
" call Decho('case "refresh directory listing": newdir == "./"')
call s:SetRexDir(a:islocal,dirname)

elseif newdir == '../'
" -----
" go up one directory
" -----
" call Decho('case "go up one directory": newdir
== "../"')

if w:netrw_liststyle == s:TREELIST && exists("w:netrw_treedict")
" force a refresh
" call Decho("clear buffer<".expand("%")."> with :%d")
setlocal noro ma
" call Decho("setlocal noro ma")
keepjumps %d
endif

if has("amiga")
" amiga
" call Decho('case "go up one directory": newdir == "../" and amiga')
if a:islocal
let dirname= substitute(dirname,'^\(.*[:])\([^\|]+\)$','\1,')
let dirname= substitute(dirname,'/$','')
else
let dirname= substitute(dirname,'^\(.*[:])\([^\|+]/\)$','\1,')
endif
" call Decho("amiga: dirname<".dirname."> (go up one dir)")

else
" unix or cygwin
" call Decho('case "go up one directory": newdir == "../" and unix or cygwin')
if a:islocal
let dirname= substitute(dirname,'^\(.*\)\([^\|+]/\)$','\1,')
if dirname == ""
let dirname= '/'
endif
else
let dirname= substitute(dirname,'^\(a+://\{-}\{1,2}\)\(\{-}\)\([^\|+]/\)$','\1\2,')

```

```

endif
" call Decho("unix: dirname<".dirname."> (go up one dir)")
endif
call s:SetRexDir(a:islocal,dirname)

elseif exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && exists("w:netrw_treedict")
" call Decho('case liststyle is TREELIST and w:netrw_treedict exists')
" force a refresh (for TREELIST, wait for NetrwTreeDir() to force the refresh)
setlocal noro ma
" call Decho("setlocal noro ma")
if !(exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && exists("b:netrw_curdir"))
" call Decho("clear buffer<".expand("%")."> with :%d")
keepjumps %d
endif
let treedir = s:NetrwTreeDir()
let s:treecurpos = nbc_d_curpos
let haskey= 0
" call Decho("w:netrw_treedict<".string(w:netrw_treedict).">")

" search treedict for tree dir as-is
if has_key(w:netrw_treedict,treedir)
" call Decho('....searched for treedir<'.treedir.> : found it!')
let haskey= 1
else
"
call Decho('....searched for treedir<'.treedir.> : not found')
endif

" search treedict for treedir with a / appended
if !haskey && treedir !~ '/'
if has_key(w:netrw_treedict,treedir."/")
let treedir= treedir. "/"
" call Decho('....searched for treedir<'.treedir.> found it!')
let haskey = 1
else
" call Decho('....searched for treedir<'.treedir.'/> : not found')
endif
endif

" search treedict for treedir with any trailing / elided
if !haskey && treedir =~ '/'
let treedir= substitute(treedir,'/$',",")
if has_key(w:netrw_treedict,treedir)
" call Decho('....searched for treedir<'.treedir.> found it!')
let haskey = 1
else
" call Decho('....searched for treedir<'.treedir.> : not found')
endif
endif

```

```

endif

if haskey
  " close tree listing for selected subdirectory
  " call Decho("closing selected subdirectory<".dirname.">")
  call remove(w:netrw_treedict,treedir)
  "
  call Decho("removed  entry<".dirname."> from treedict")
  " call Decho("yielding treedict<".string(w:netrw_treedict).">")
  let dirname= w:netrw_treetop
  else
    " go down one directory
    let dirname= substitute(treedir,'*$', '/',")
  " call Decho("go down one dir: treedir<".treedir.">")
  endif
  call s:SetRexDir(a:islocal,dirname)

else
  " go down one directory
  let dirname= s:ComposePath(dirname,newdir)
  " call Decho("go down one dir: dirname<".dirname."> newdir<".newdir.">")
  call s:SetRexDir(a:islocal,dirname)
endif

call s:NetrwOptionRestore("s:")
if dolockout
  " call Decho("doing modification lockout settings: ma nomod noro")
  setlocal ma nomod noro
  " call Decho("setlocal ma nomod noro")
endif

" call Dret("s:NetrwBrowseChgDir <".dirname."> : curpos<".string(getpos(".")).">")
return dirname
endfun

" -----
" s:NetrwBrowseX: allows users to write
custom functions to operate on {{2
"      files given their extension. Passes 0=local, 1=remote
fun! netrw#NetrwBrowseX(fname,remote)
" call Dfunc("NetrwBrowseX(fname<".a:fname."> remote=" .a:remote.")")

" set up the filename
" (lower case the extension, make a local copy of a remote file)
let exten= substitute(a:fname,'.*\(\{-}\)',\1,'e')
if has("win32") || has("win95") || has("win64") || has("win16")
  let exten= substitute(exten,'^.*$',\L&\E,")
endif

```

```

" call Decho("exten<".exten.">")

" seems kde systems often have gnome-open due to dependencies, even though
" gnome-open's subsidiary display tools are largely absent. Kde systems
" usually have "kdeinit" running, though... (tnx Mikolaj Machowski)
if !exists("s:haskdeinit")
if has("unix")
let s:haskdeinit= system("ps -e") =~ 'kdeinit'
if v:shell_error
let s:haskdeinit = 0
endif
else
let s:haskdeinit= 0
endif
" call Decho("setting s:haskdeinit=".s:haskdeinit)
endif

if a:remote == 1
" create a local copy
" call Decho("a:remote=".a:remote.": create a local copy of <"a:fname.">")
setlocal bh=delete
call netrw#NetRead(3,a:fname)
" attempt to rename tempfile
let basename= substitute(a:fname,'^\(.*\)\/\(.*\)\.\([^\.]*\)$','\2','')
let newname= substitute(s:netrw_tmpfile,'^\(.*\)\/\(.*\)\.\([^\.]*\)$','\1/'.basename.'.\3','')
" call Decho("basename<".basename.">")
" call Decho("newname <".newname.">")
if rename(s:netrw_tmpfile,newname) == 0
" renaming succeeded
let fname= newname
else
" renaming failed
let fname= s:netrw_tmpfile
endif
else
let fname= a:fname
endif
" call Decho("fname<".fname.">")
" call Decho("exten<".exten.">")
"."netrwFileHandlers#NFH_".exten."():exists=".exists("*netrwFileHandlers#NFH_".exten))

" set up redirection
if &srr =~ "%s"
if (has("win32") || has("win95") || has("win64") || has("win16"))
let redir= substitute(&srr,"%s","nul","")
else
let redir= substitute(&srr,"%s","/dev/null","")
endif
endif

```

```

elseif (has("win32") || has("win95") || has("win64") || has("win16"))
  let redir= &srr . "nul"
else
  let redir= &srr . "/dev/null"
endif
" call Decho("redir{" .redir." } srr{" .&srr."})

" extract any viewing options. Assumes that they're set apart by quotes.
if exists("g:netrw_browse_viewer")
  if g:netrw_browse_viewer =~ '\s'
    let viewer = substitute(g:netrw_browse_viewer, '\s.*$', "")
    let viewopt = substitute(g:netrw_browse_viewer, '^(\S\+\s*)$', "")
    let oviewer = ""
    let cnt = 1
    while !executable(viewer) && viewer != oviewer
      let viewer = substitute(g:netrw_browse_viewer, '^(\S\+\s+)\{'.cnt.'\}\S\+)(.*)$', '\1,')
      let viewopt = substitute(g:netrw_browse_viewer, '^(\S\+\s+)\{'.cnt.'\}\S\+)(.*)$', '\3,'). " "
      let cnt = cnt + 1
      let oviewer = viewer
    " call Decho("!exe: viewer<".viewer.">
viewopt<".viewopt.">")
    endwhile
  else
    let viewer = g:netrw_browse_viewer
    let viewopt = ""
  endif
" call Decho("viewer<".viewer."> viewopt<".viewopt.">")
endif

" execute the file handler
if exists("g:netrw_browse_viewer") && g:netrw_browse_viewer == '-'
" call Decho("g:netrw_browse_viewer<".g:netrw_browse_viewer.">")
let ret= netrwFileHandlers#Invoke(exten,fname)

elseif exists("g:netrw_browse_viewer") && executable(viewer)
" call Decho("g:netrw_browse_viewer<".g:netrw_browse_viewer.">")
" call Decho("exe silent !".viewer." ".viewopt.shellescape(fname,1).redir)
exe "silent !".viewer." ".viewopt.shellescape(fname,1).redir
let ret= v:shell_error

elseif has("win32") || has("win64")
" call Decho('exe silent !start rundll32 url.dll,FileProtocolHandler '.shellescape(fname,1))
exe 'silent !start rundll32 url.dll,FileProtocolHandler '.shellescape(fname,1)
call inputsave()|call input("Press <cr> to continue")|call
inputrestore()
let ret= v:shell_error

elseif has("unix") && executable("gnome-open") && !s:haskdeinit

```



```

" call Decho("exe silent !gnome-open ".shellescape(fname,1)." ".redir)
exe "silent !gnome-open ".shellescape(fname,1).redir
let ret= v:shell_error

elseif has("unix") && executable("kfmclient") && s:haskdeinit
" call Decho("exe silent !kfmclient exec ".shellescape(fname,1)." ".redir)
exe "silent !kfmclient exec ".shellescape(fname,1)." ".redir
let ret= v:shell_error

elseif has("macunix") && executable("open")
" call Decho("exe silent !open ".shellescape(fname,1)." ".redir)
exe "silent !open ".shellescape(fname,1)." ".redir
let ret= v:shell_error

else
" netrwFileHandlers#Invoke() always returns 0
let ret= netrwFileHandlers#Invoke(exten,fname)
endif

" if unsuccessful, attempt netrwFileHandlers#Invoke()
if ret
let ret= netrwFileHandlers#Invoke(exten,fname)
endif

" restoring redraw! after external
file handlers
redraw!

" cleanup: remove temporary file,
" delete current buffer if success with handler,
" return to prior buffer (directory listing)
" Feb 12, 2008: had to de-activate removal of
" temporary file because it wasn't getting seen.
" if a:remote == 1 && fname != a:fname
" call Decho("deleting temporary file<".fname.">")
" call s:NetrwDelete(fname)
" endif

if a:remote == 1
setlocal bh=delete bt=nofile
if g:netrw_use_noswf
setlocal noswf
endif
exe "norm! \<c-o>"
" redraw!
endif

" call Dret("NetrwBrowseX")

```

endfun

```
" -----
" netrw#Explore: launch the local browser in the directory of the current file {{{2
"     indx: == -1: Nexplore
"         == -2: Pexplore
"         == +: this is overloaded:
"             * If Nexplore/Pexplore is in use, then this refers to the
"
"             indx'th item in the w:netrw_explore_list[] of items which
"             matched the */pattern */pattern */pattern */pattern
"             * If Hexplore or Vexplore, then this will override
"             g:netrw_winsize to specify the qty of rows or columns the
"             newly split window should have.
"     dosplit==0: the window will be split iff the current file has been modified
"     dosplit==1: the window will be split before running the local browser
"     style == 0: Explore   style == 1: Explore!
"           == 2: Hexplore style == 3: Hexplore!
"           == 4: Vexplore style == 5: Vexplore!
"           == 6: Texplore
"DechoTabOn
fun! netrw#Explore(indx,dosplit,style,...)
" call Dfunc("netrw#Explore(indx=".a:indx." dosplit=".a:dosplit." style=".a:style.",a:1<".a:1.">)
&modified=".&modified." a:0="a:0)
if !exists("b:netrw_curdir")
    let b:netrw_curdir=
getcwd()
" call Decho("set b:netrw_curdir<"b:netrw_curdir."> (used getcwd)")
endif
let curfile= b:netrw_curdir
" call Decho("curfile<".curfile.">")

" save registers
silent! let keepregstar = @*
silent! let keepregplus = @+
silent! let keepregslash= @/

" if dosplit or file has been modified
if a:dosplit || &modified || a:style == 6
" call Decho("case: dosplit=".a:dosplit." modified=".&modified." a:style=".a:style)
call s:SaveWinVars()
let winsize= g:netrw_winsize
if a:indx > 0
    let winsize= a:indx
endif

if a:style == 0    " Explore, Sexplore
" call Decho("style=0: Explore or Sexplore")
```

```

exe winsize."wincmd s"

elseif a:style == 1 "Explore!, Sexplore!
" call Decho("style=1: Explore! or Sexplore!")
exe winsize."wincmd v"

elseif a:style == 2 " Hexplore
" call Decho("style=2: Hexplore")
exe "bel ".winsize."wincmd s"

elseif a:style == 3 " Hexplore!
" call Decho("style=3: Hexplore!")
exe "abo ".winsize."wincmd s"

elseif a:style == 4 " Vexplore
" call Decho("style=4: Vexplore")
exe "lefta ".winsize."wincmd v"

elseif a:style == 5 " Vexplore!
" call Decho("style=5: Vexplore!")
exe "rightb ".winsize."wincmd v"

elseif a:style == 6 " Texplore
call s:SaveBufVars()
" call Decho("style = 6: Texplore")
tabnew
call s:RestoreBufVars()
endif
call s:RestoreWinVars()
endif
norm! 0

if a:0 > 0
" call Decho("case [a:0=".a:0.]">0: a:1<".a:1.">")
if a:1 =~ '^\\~' && (has("unix") || (exists("g:netrw_cygwin") && g:netrw_cygwin))
let dirname= substitute(a:1, '\\~', expand("$HOME"),)
" call Decho("using dirname<".dirname."> (case: ~ && unix|cygwin)")
elseif a:1 == '.'
let dirname= exists("b:netrw_curdir"? b:netrw_curdir : getcwd()
if dirname !~ '\\$'
let dirname= dirname."/\"
endif
" call Decho("using dirname<".dirname."> (case: ".(exists("b:netrw_curdir"?
"b:netrw_curdir" : "getcwd()).)")")
elseif a:1 =~ '\\$'
let dirname= expand(a:1)
else
let dirname= a:1

```

```

" call Decho("using dirname<".dirname.">")
endif
else
" clear explore
" call Decho("clearing explore variables")
2match none
if exists("s:explore_match") |unlet s:explore_match |endif
if exists("s:explore_indx") |unlet s:explore_indx |endif
if exists("s:dirstarstar") |unlet s:dirstarstar |endif
if exists("s:dirstarstar") |unlet s:dirstarstar |endif
if exists("w:netrw_explore_indx") |unlet w:netrw_explore_indx |endif
if exists("w:netrw_explore_listlen")|unlet w:netrw_explore_listlen|endif
if exists("w:netrw_explore_list") |unlet w:netrw_explore_list |endif
if exists("w:netrw_explore_bufnr") |unlet w:netrw_explore_bufnr |endif
" redraw!
echo " "
echo " "
" call Dret("netrw#Explore : cleared list")
return
endif

if
dirname =~ '\*\*/'
" handle .../**/.../filepat
" call Decho("case Explore .../**/.../filepat")
let prefixdir= substitute(dirname,'\{.-}\*\*.*$',\1,"")
if prefixdir =~ '^/' || (prefixdir =~ '^a:/' && (has("win32") || has("win95") || has("win64") || has("win16")))
let b:netrw_curdir = prefixdir
else
let b:netrw_curdir= getcwd().'prefixdir
endif
let dirname= substitute(dirname,'\{.-}\(\*\*/.*\)$',\1,"")
let starpat= 4;
" call Decho("pwd<".getcwd()."> dirname<".dirname.">")
" call Decho("case Explore ../**/.../filepat (starpat=".starpat.")")

elseif dirname =~ '\*\*/'
" starpat=1: Explore */pattern (current directory only search for files containing pattern)
" call Decho("case Explore */pattern")
let pattern= substitute(dirname,'\*/\(.*)$',\1,"")
let starpat= 1
" call Decho("Explore */pat: (starpat=".starpat.") dirname<".dirname."> -> pattern<".pattern.">")
if &hls | let keepregslash= s:ExplorePatHls(pattern)
| endif

elseif dirname =~ '\*\*/'
" starpat=2: Explore **//pattern (recursive descent search for files containing pattern)
" call Decho("case Explore **//pattern")

```

```

let pattern= substitute(dirname, '^.*\*/', '')
let starpat= 2
" call Decho("Explore **//pat: (starpat=".starpat.") dirname<".dirname."> -> pattern<".pattern.">")

elseif dirname =~ '\*/'
" starpat=3: Explore */filepat (search in current directory for filenames matching filepat)
let starpat= 3
" call Decho("case Explore */filepat (starpat=".starpat.")")

elseif dirname =~ '\*\*/'
" starpat=4: Explore **/filepat (recursive descent search for filenames matching filepat)
let starpat= 4
" call Decho("case Explore **/filepat (starpat=".starpat.")")
else
let starpat= 0
endif

if starpat == 0 && a:indx >= 0
" [Explore Hexplore Vexplore Sexplore] [dirname]
" call Decho("case dirname<".dirname."> a:indx=".a:indx.": Explore Hexplore Vexplore
Sexplore")
if dirname == ""
let dirname= substitute(expand("%:~"), '^(\.[^/])[^/]*$', '\1', 'e')
endif
if dirname =~ '^scp:' || dirname =~ '^ftp:'
" call Decho("calling NetrwBrowse(0,dirname<".dirname.">)")
call s:NetrwBrowse(0,dirname)
else
if dirname == "" | let dirname= getcwd() | endif
" call Decho("calling LocalBrowseCheck(dirname<".dirname.">)")
call netrw#LocalBrowseCheck(dirname)
endif

" call Decho("curfile<".curfile.">")
if has("win32") || has("win95") || has("win64") || has("win16")
call search('\<.substitute(curfile, '^.*\[/\]', 'e').\>', 'cW')
else
call search('\<.substitute(curfile, '^.*\[/\]', 'e').\>', 'cW')
endif

" starpat=1: Explore */pattern (current directory only search for files containing pattern)
" starpat=2: Explore **//pattern (recursive descent search for files containing pattern)
" starpat=3: Explore */filepat (search in current directory for filenames matching filepat)
" starpat=4: Explore **/filepat (recursive descent search for filenames matching filepat)
elseif a:indx <= 0
" Nexplore, Pexplore, Explore: handle starpat
" call Decho("case Nexplore, Pexplore, <s-down>, <s-up>: starpat=".starpat." a:indx=".a:indx)
if !mapcheck("<s-up>", "n") && !mapcheck("<s-down>", "n") && exists("b:netrw_curdir")

```

```

" call Decho("set up <s-up> and <s-down> maps")
let s:didstarstar= 1
nnoremap <buffer> <silent> <s-up> :Pexplore<cr>
nnoremap <buffer> <silent> <s-down> :Nexplore<cr>
endif

if has("path_extra")
" call Decho("starpat=".starpat.": has +path_extra")
if !exists("w:netrw_explore_indx")
let w:netrw_explore_indx= 0
endif

let indx = a:indx
" call Decho("starpat=".starpat.": set indx= [a:indx=".indx."]")

if indx == -1
" Nexplore
" call Decho("case Nexplore with starpat=".starpat.": (indx=".indx.")")
if !exists("w:netrw_explore_list") " sanity check
call netrw#ErrorMsg(s:WARNING,"using
Nexplore or <s-down> improperly; see help for netrw-starstar",40)
silent! let @* = keepregstar
silent! let @+ = keepregstar
silent! let @/ = keepregslash
" call Dret("netrw#Explore")
return
endif
let indx= w:netrw_explore_indx
if indx < 0 | let indx= 0 | endif
if indx >= w:netrw_explore_listlen | let indx= w:netrw_explore_listlen - 1 | endif
let curfile= w:netrw_explore_list[indx]
" call Decho("indx=".indx." curfile<".curfile.">")
while indx < w:netrw_explore_listlen && curfile == w:netrw_explore_list[indx]
let indx= indx + 1
" call Decho("indx=".indx." (Nexplore while loop)")
endwhile
if indx >= w:netrw_explore_listlen | let indx= w:netrw_explore_listlen - 1 | endif
" call Decho("Nexplore: indx= [w:netrw_explore_indx=".w:netrw_explore_indx."]=.indx)

elseif indx == -2
" Pexplore
" call Decho("case
Pexplore with starpat=".starpat.": (indx=".indx.")")
if !exists("w:netrw_explore_list") " sanity check
call netrw#ErrorMsg(s:WARNING,"using Pexplore or <s-up> improperly; see help for netrw-starstar",41)
silent! let @* = keepregstar
silent! let @+ = keepregstar
silent! let @/ = keepregslash

```

```

"    call Dret("netrw#Explore")
    return
endif
let indx= w:netrw_explore_indx
if indx < 0          | let indx= 0          | endif
if indx >= w:netrw_explore_listlen | let indx= w:netrw_explore_listlen - 1 | endif
let curfile= w:netrw_explore_list[indx]
"    call Decho("indx=".indx." curfile<".curfile.">")
while indx >= 0 && curfile == w:netrw_explore_list[indx]
    let indx= indx - 1
"    call Decho("indx=".indx." (Pexplore while loop)")
endwhile
if indx < 0          | let indx= 0          | endif
"    call Decho("Pexplore: indx=
[w:netrw_explore_indx=".w:netrw_explore_indx."]=.indx)

else
" Explore -- initialize
" build list of files to Explore with Nexplore/Pexplore
"    call Decho("starpat=".starpat.": case Explore: initialize (indx=".indx.")")
let w:netrw_explore_indx= 0
if !exists("b:netrw_curdir")
    let b:netrw_curdir= getcwd()
endif
"    call Decho("starpat=".starpat.": b:netrw_curdir<".b:netrw_curdir.">")

" switch on starpat to build the w:netrw_explore_list of files
if starpat == 1
" starpat=1: Explore */pattern (current directory only search for files containing pattern)
"    call Decho("starpat=".starpat.": build */pattern list")
"    call Decho("pattern<".pattern.">")
exe "vimgrep /".pattern."/gj ".fnameescape(b:netrw_curdir)."/*"
let w:netrw_explore_list = map(getqflist(),'bufname(v:val.bufnr)')
if &hls | let keepregslash= s:ExplorePatHls(pattern) | endif

elseif starpat == 2
" starpat=2:
Explore */pattern (recursive descent search for files containing pattern)
"    call Decho("starpat=".starpat.": build */pattern list")
try
    exe "silent vimgrep /".pattern."/gj ". "**/*"
catch /^Vim%((\a\+)\)=:E480/
    call netrw#ErrorMsg(s:WARNING,'no files matched pattern<'.pattern.>',45)
if &hls | let keepregslash= s:ExplorePatHls(pattern) | endif
silent! let @* = keepregstar
silent! let @+ = keepregstar
silent! let @/ = keepregslash
"    call Dret("netrw#Explore : no files matched pattern")

```

```

return
endtry
let s:netrw_curdir = b:netrw_curdir
let w:netrw_explore_list = getqflist()
let w:netrw_explore_list = map(w:netrw_explore_list, 's:netrw_curdir.' . bufname(v:val.bufnr)')

elseif starpat == 3
" starpat=3: Explore */filepat (search in current directory for filenames matching filepat)
" call Decho("starpat=" . starpat . ": build */filepat list")
let
filepat= substitute(dirname, '^\\*/', '')
let filepat= substitute(filepat, '[%#<]', '\\&')
" call Decho("b:netrw_curdir<" . b:netrw_curdir . ">")
" call Decho("filepat<" . filepat . ">")
let w:netrw_explore_list= split(expand(b:netrw_curdir.'/' . filepat), '\n')
if &hls | let keepregslash= s:ExplorePatHls(filepat) | endif

elseif starpat == 4
" starpat=4: Explore **/filepat (recursive descent search for filenames matching filepat)
" call Decho("starpat=" . starpat . ": build **/filepat list")
let w:netrw_explore_list= split(expand(b:netrw_curdir.'/' . dirname), '\n')
if &hls | let keepregslash= s:ExplorePatHls(dirname) | endif
endif " switch on starpat to build w:netrw_explore_list

let w:netrw_explore_listlen = len(w:netrw_explore_list)
" call Decho("w:netrw_explore_list<" . string(w:netrw_explore_list) . ">")
" call Decho("w:netrw_explore_listlen=" . w:netrw_explore_listlen)

if w:netrw_explore_listlen == 0
|| (w:netrw_explore_listlen == 1 && w:netrw_explore_list[0] =~ "\*\*\v")
call netrw#ErrorMsg(s:WARNING, "no files matched", 42)
silent! let @* = keepregstar
silent! let @+ = keepregstar
silent! let @/ = keepregslash
" call Dret("netrw#Explore : no files matched")
return
endif
endif " if indx ... endif

" NetrwStatusLine support - for exploring support
let w:netrw_explore_indx= indx
" call Decho("explorelist<" . join(w:netrw_explore_list, ',') . "> len=" . w:netrw_explore_listlen)

" wrap the indx around, but issue a note
if indx >= w:netrw_explore_listlen || indx < 0
" call Decho("wrap indx (indx=" . indx . " listlen=" . w:netrw_explore_listlen . ")")
let indx = (indx < 0)? ( w:netrw_explore_listlen - 1 ) : 0
let w:netrw_explore_indx= indx

```



```

    call netrw#ErrorMsg(s:NOTE,"no more files match Explore pattern",43)
endif

exe "let dirfile= w:netrw_explore_list[.indx.]"
" call Decho("dirfile=w:netrw_explore_list[indx=.indx.]=
<".dirfile.">")
let newdir= substitute(dirfile,'[/\]*$',",e')
" call Decho("newdir<".newdir.">")

" call Decho("calling LocalBrowseCheck(newdir<".newdir.">)")
call netrw#LocalBrowseCheck(newdir)
if !exists("w:netrw_liststyle")
let w:netrw_liststyle= g:netrw_liststyle
endif
if w:netrw_liststyle == s:THINLIST || w:netrw_liststyle == s:LONGLIST
call search('^'.substitute(dirfile,"^.*"/,"","").'\>', "W")
else
call search('\<'.substitute(dirfile,"^.*"/,"","").'\>', "w")
endif
let w:netrw_explore_mtchcnt = indx + 1
let w:netrw_explore_bufnr = bufnr("%")
let w:netrw_explore_line = line(".")
call s:SetupNetrwStatusLine('%f %h%m%r%=%9*% {NetrwStatusLine()}')
" call Decho("explore: mtchcnt=".w:netrw_explore_mtchcnt." bufnr=".w:netrw_explore_bufnr."
line#".w:netrw_explore_line)

else
" call Decho("your vim does not have +path_extra")
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:WARNING,"your vim needs the +path_extra feature for Exploring with **!",44)
endif
silent! let @* = keepregstar
silent! let @+ = keepregstar
silent! let @/ = keepregslash
" call Dret("netrw#Explore : missing +path_extra")
return
endif

else
" call Decho("case Explore newdir<".dirname.">")
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && dirname =~ '/'
silent! unlet w:netrw_treedict
silent! unlet w:netrw_treetop
endif
let newdir= dirname
if !exists("b:netrw_curdir")
call netrw#LocalBrowseCheck(getcwd())
else

```

```

    call netrw#LocalBrowseCheck(s:NetrwBrowseChgDir(1,newdir))
endif
endif

" visual display of **/ **// */ Exploration files
if exists("w:netrw_explore_indx") && exists("b:netrw_curdir")
if !exists("s:explore_prvdir") || s:explore_prvdir != b:netrw_curdir
" only update match list if current directory isn't the same as before
let s:explore_prvdir = b:netrw_curdir
let s:explore_match = ""
let dirlen = strlen(b:netrw_curdir)
if b:netrw_curdir !~ '/'$'
let dirlen= dirlen + 1
endif
let prvfname= ""
for fname in w:netrw_explore_list
" call Decho("fname<".fname.">")
"COMBAK -- g:netrw_markfileesc.""g:netrw_markfileesc."" ???
if fname =~ '^'.b:netrw_curdir
if s:explore_match == ""
let s:explore_match= '\<'.escape(strpart(fname,dirlen),g:netrw_markfileesc).\>'
else
let s:explore_match= s:explore_match.\|\<'.escape(strpart(fname,dirlen),g:netrw_markfileesc).\>'
endif
elseif fname !~ '^/' && fname != prvfname
if s:explore_match == ""
let s:explore_match= '\<'.escape(fname,g:netrw_markfileesc).\>'
else
let s:explore_match= s:explore_match.\|\<'.escape(fname,g:netrw_markfileesc).\>'
endif
endif
let prvfname= fname
endifor
" call Decho("explore_match<".s:explore_match.">")
exe "2match netrwMarkFile /".s:explore_match."/\"
endif
echo "<s-up>==Pexplore <s-down>==Nexplore"
else
2match none
if exists("s:explore_match") | unlet s:explore_match | endif
if exists("s:explore_prvdir") | unlet s:explore_prvdir | endif
echo " "
" call Decho("cleared explore match list")
endif

silent! let @* = keepregstar
silent! let @+ = keepregstar
silent! let @/ = keepregslash

```

```

" call Dret("netrw#Explore : @/<".@/.">")
endfun

" -----
" s:NetrwHide: this function is invoked by the "a" map for browsing {{{2
"   and switches the hiding mode. The actual hiding is done by
"   s:NetrwListHide().
"       g:netrw_hide= 0: show all
"           1: show not-hidden files
"           2: show hidden files only
fun! s:NetrwHide(islocal)
" call Dfunc("NetrwHide(islocal=".a:islocal.") g:netrw_hide=".g:netrw_hide)
let svpos= netrw#NetrwSavePosn()

if exists("s:netrwmarkfilelist_{bufnr('%')}")
" call Decho(((g:netrw_hide == 1)? "unhide" : "hide")." files in
markfilelist<".string(s:netrwmarkfilelist_{bufnr("%")}).">")
" call Decho("g:netrw_list_hide<".g:netrw_list_hide.">")

" hide the files in the markfile list
for fname in s:netrwmarkfilelist_{bufnr("%")}
" call Decho("match(g:netrw_list_hide<".g:netrw_list_hide.">
fname<<'\.fname.\>>)='.match(g:netrw_list_hide,\<'\.fname.\>')." isk=".&isk)
if match(g:netrw_list_hide,\<'\.fname.\>') != -1
" remove fname from hiding list
let g:netrw_list_hide= substitute(g:netrw_list_hide,'\<'.escape(fname,g:netrw_fname_escape).\>..',';")
let g:netrw_list_hide= substitute(g:netrw_list_hide,',,',';g')
let g:netrw_list_hide= substitute(g:netrw_list_hide,'^,\|,$',';")
" call Decho("unhide: g:netrw_list_hide<".g:netrw_list_hide.">")
else
" append fname to hiding
list
if exists("g:netrw_list_hide") && g:netrw_list_hide != ""
let g:netrw_list_hide= g:netrw_list_hide.\<'.escape(fname,g:netrw_fname_escape).\>'
else
let g:netrw_list_hide= "\<'.escape(fname,g:netrw_fname_escape).\>'
endif
" call Decho("hide: g:netrw_list_hide<".g:netrw_list_hide.">")
endif
endfor
call s:NetrwUnmarkList(bufnr("%"),b:netrw_curdir)
let g:netrw_hide= 1

else

" switch between show-all/show-not-hidden/show-hidden
let g:netrw_hide=(g:netrw_hide+1)%3
exe "norm! 0"

```

```

if g:netrw_hide && g:netrw_list_hide == ""
  call netrw#ErrorMsg(s:WARNING,"your hiding list is empty!",49)
"  call Dret("NetrwHide")
  return
endif
endif

call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal, './'))
call netrw#NetrwRestorePosn(svpos)
" call Dret("NetrwHide")
endfun

" -----
" s:NetrwHidden: invoked by "gh" {{{2
fun!
s:NetrwHidden(islocal)
" call Dfunc("s:NetrwHidden()")
" save current position
let svpos= netrw#NetrwSavePosn()

if g:netrw_list_hide =~ \(^\|,\|)\|^\|s\|s\|)\|zs\|.\|S\|+'
" remove pattern from hiding list
let g:netrw_list_hide= substitute(g:netrw_list_hide, \(^\|,\|)\|^\|s\|s\|)\|zs\|.\|S\|+',")
elseif strlen(g:netrw_list_hide) >= 1
let g:netrw_list_hide= g:netrw_list_hide . ', \(^\|s\|s\|)\|zs\|.\|S\|+'
else
let g:netrw_list_hide= \(^\|s\|s\|)\|zs\|.\|S\|+'
endif

" refresh screen and return to saved position
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal, './'))
call netrw#NetrwRestorePosn(svpos)
" call Dret("s:NetrwHidden")
endfun

" -----
" s:NetrwHome: this function determines a "home" for saving bookmarks and history {{{2
fun! s:NetrwHome()
" call Dfunc("s:NetrwHome()")
if exists("g:netrw_home")
let home= g:netrw_home
else
" go to
vim plugin home
for home in split(&rtpl, ',') + [""]
if isdirectory(home) && filewritable(home) | break | endif
let basehome= substitute(home, '[^\|]\|.vim$', "", "")
if isdirectory(basehome) && filewritable(basehome)

```

```

    let home= basehome."/.vim"
    break
endif
endfor
if home == ""
    " just pick the first directory
"   call Decho("just pick first directory in &rtp")
    let home= substitute(&rtp,','.*$',",")
endif
if (has("win32") || has("win95") || has("win64") || has("win16"))
    let home= substitute(home, '/', '\\', 'g')
endif
endif
" insure that the home directory exists
" call Decho("picked home<".home.">")
if !isdirectory(home)
    if exists("g:netrw_mkdir")
"   call Decho("home<".home."> isn't a directory -- making it now with g:netrw_mkdir<".g:netrw_mkdir.">")
"   call Decho("system("g:netrw_mkdir." ".s:Escape(home).")")
        call system(g:netrw_mkdir." ".s:Escape(home))
    else
"   call Decho("home<".home.">
isn't a directory -- making it now with mkdir()")
        call mkdir(home)
    endif
endif
let g:netrw_home= home
" call Dret("s:NetrwHome <".home.">")
return home
endfun

" -----
" s:NetrwLeftmouse: handles the <leftmouse> when in a netrw browsing window {{{2
fun! s:NetrwLeftmouse(islocal)
" call Dfunc("s:NetrwLeftmouse(islocal=".a:islocal.")")
if a:islocal
    if exists("b:netrw_curdir")
        call netrw#LocalBrowseCheck(s:NetrwBrowseChgDir(1,s:NetrwGetWord()))
    endif
else
    if exists("b:netrw_curdir")
        call s:NetrwBrowse(0,s:NetrwBrowseChgDir(0,s:NetrwGetWord()))
    endif
endif
" call Dret("s:NetrwLeftmouse")
endfun

" -----

```

```

" s:NetrwListHide: uses [range]g~...~d to delete files that match comma {{{2
" separated patterns given in g:netrw_list_hide
fun! s:NetrwListHide()
" call Dfunc("NetrwListHide() hide=".g:netrw_hide."
listhide<"g:netrw_list_hide.">")

" find a character not in the "hide" string to use as a separator for :g and :v commands
" How-it-works: take the hiding command, convert it into a range. Duplicate
" characters don't matter. Remove all such characters from the '/~...90'
" string. Use the first character left as a separator character.
let listhide= g:netrw_list_hide
let sep = strpart(substitute('/~@#$$%^&*{ };;,<.>?[1234567890','[.escape(listhide,-]^\).'],'',ge'),1,1)
" call Decho("sep=".sep)

while listhide != ""
if listhide =~ ','
let hide = substitute(listhide,','.*$',','e')
let listhide = substitute(listhide,'^\{-},\{.*\}$','1','e')
else
let hide = listhide
let listhide = ""
endif

" Prune the list by hiding any files which match
if g:netrw_hide == 1
" call Decho("hiding<".hide."> listhide<".listhide.">")
exe 'silent keepjumps '.w:netrw_bannercnt.',$g'.sep.hide.sep.'d'
elseif
g:netrw_hide == 2
" call Decho("showing<".hide."> listhide<".listhide.">")
exe 'silent keepjumps '.w:netrw_bannercnt.',$g'.sep.hide.sep.'s@^@ /-KEEP-/ @'
endif
endwhile
if g:netrw_hide == 2
exe 'silent keepjumps '.w:netrw_bannercnt.',$v@^ /-KEEP-/ @d'
exe 'silent keepjumps '.w:netrw_bannercnt.',$s@^%( /-KEEP-/ \)|+@ @e'
endif

" call Dret("NetrwListHide")
endfun

" -----
" NetrwHideEdit: allows user to edit the file/directory hiding list
fun! s:NetrwHideEdit(islocal)
" call Dfunc("NetrwHideEdit(islocal=".a:islocal.")")

" save current cursor position
let svpos= netrw#NetrwSavePosn()

```

```

" get new hiding list from user
call inputsave()
let newhide= input("Edit Hiding List: ",g:netrw_list_hide)
call inputrestore()
let g:netrw_list_hide= newhide
" call Decho("new g:netrw_list_hide<"g:netrw_list_hide.">")

" refresh the listing
silent call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,"./"))

" restore cursor position
call netrw#NetrwRestorePosn(svpos)

" call Dret("NetrwHideEdit")
endfun

" -----
" NetSortSequence: allows user to edit the sorting sequence
fun! s:NetSortSequence(islocal)
" call Dfunc("NetSortSequence(islocal="a:islocal.")")

let svpos= netrw#NetrwSavePosn()
call inputsave()
let newsortseq= input("Edit Sorting Sequence: ",g:netrw_sort_sequence)
call inputrestore()

" refresh the listing
let g:netrw_sort_sequence= newsortseq
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'./'))
call netrw#NetrwRestorePosn(svpos)

" call Dret("NetSortSequence")
endfun

" -----
" s:NetrwMakeDir: this function makes a directory (both local and remote) {{{2
fun! s:NetrwMakeDir(usrhost)
" call Dfunc("NetrwMakeDir(usrhost<"a:usrhost.">")

" get name of new directory from user. A bare <CR> will skip.
" if its currently a directory, also request will be skipped, but with
" a message.
call inputsave()
let newdirname= input("Please give directory name: ")
call inputrestore()
" call Decho("newdirname<"newdirname.">")

```

```

if newdirname == ""
" call Dret("NetrwMakeDir : user aborted with bare <cr>")
return
endif

if a:usrhost == ""
" call Decho("local mkdir")

" Local mkdir:
" sanity checks
let fullnewdir= b:netrw_curdir.'/'.newdirname
" call Decho("fullnewdir<".fullnewdir.">")
if isdirectory(fullnewdir)
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:WARNING,"<".newdirname."> is already a directory!",24)
endif
" call Dret("NetrwMakeDir : directory<".newdirname."> exists previously")
return
endif
if s:FileReadable(fullnewdir)
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:WARNING,"<".newdirname."> is already a file!",25)
endif
" call Dret("NetrwMakeDir : file<".newdirname."> exists previously")
return
endif

" requested new local directory is neither a pre-existing file or
" directory, so make it!
if exists("*mkdir")
call mkdir(fullnewdir,"p")
else
let netrw_origdir= s:NetrwGetcwd(1)
exe 'keepjumps lcd '.fnameescape(b:netrw_curdir)
" call Decho("netrw_origdir<".netrw_origdir.">: lcd b:netrw_curdir<".fnameescape(b:netrw_curdir).">")
" call Decho("exe silent! !".g:netrw_local_mkdir.' '.shellescape(newdirname,1))
exe "silent! !".g:netrw_local_mkdir.' '.shellescape(newdirname,1)
if !g:netrw_keepdir
exe 'keepjumps lcd '.fnameescape(netrw_origdir)
" call Decho("netrw_keepdir=".g:netrw_keepdir.": keepjumps lcd ".fnameescape(netrw_origdir)."
getcwd<".getcwd().">")
endif
endif

if v:shell_error == 0
" refresh listing
" call Decho("refresh listing")
let svpos= netrw#NetrwSavePosn()

```



```

call s:NetrwRefresh(1,s:NetrwBrowseChgDir(1,./))
call netrw#NetrwRestorePosn(svpos)
elseif !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,"unable to make directory<".newdirname.">",26)
endif
" redraw!

elseif !exists("b:netrw_method") || b:netrw_method == 4
" Remote mkdir:
" call Decho("remote mkdir")
let mkdircmd = s:MakeSshCmd(g:netrw_mkdir_cmd)
let newdirname= substitute(b:netrw_curdir,'^\%(\{-\}\)\{3\}(\.*\)$','1',").newdirname
" call Decho("exe silent! !".mkdircmd." ".shellescape(newdirname,1))
exe "silent! !".mkdircmd." ".shellescape(newdirname,1)
if v:shell_error == 0
" refresh listing
let svpos= netrw#NetrwSavePosn()
call s:NetrwRefresh(0,s:NetrwBrowseChgDir(0,./))
call netrw#NetrwRestorePosn(svpos)
elseif !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,"unable to make directory<".newdirname.">",27)
endif
" redraw!

elseif b:netrw_method == 2
" COMBAK -- future work
call netrw#ErrorMsg(s:ERROR,"making
directories via ftp not currently supported",68)
elseif b:netrw_method == 3
" COMBAK -- future work
call netrw#ErrorMsg(s:ERROR,"making directories via ftp not currently supported",68)
endif

" call Dret("NetrwMakeDir")
endfun

" -----
" s:NetrwMarkFile: (invoked by mf) This function is used to both {{2
" mark and unmark files. If a markfile list exists,
" then the rename and delete functions will use it instead
" of whatever may happen to be under the cursor at that
" moment. When the mouse and gui are available,
" shift-leftmouse may also be used to mark files.
"
" Creates two lists
" s:netrwmarkfilelist -- holds complete paths to all marked files
" s:netrwmarkfilelist_# -- holds list of marked files in current-buffer's directory (##=bufnr())
"

```

```

" Creates a marked file match
string
" s:netrwmarkfilemtch_# -- used with 2match to display marked files
"
" Creates a buffer version of islocal
" b:netrw_islocal
"
fun! s:NetrwMarkFile(islocal,fname)
" call Dfunc("s:NetrwMarkFile(islocal=".a:islocal." fname<"a:fname.">)")
let curbufnr= bufnr("%")
let curdir = b:netrw_curdir
if exists("s:netrwmarkfilelist_{curbufnr}")
" markfile list exists
" call Decho("starting s:netrwmarkfilelist_{curbufnr}<".string(s:netrwmarkfilelist_{curbufnr}).">")
" call Decho("starting s:netrwmarkfilemtch_{curbufnr}<".s:netrwmarkfilemtch_{curbufnr}. ">")
let b:netrw_islocal= a:islocal

if index(s:netrwmarkfilelist_{curbufnr},a:fname) == -1
" append filename to buffer's markfilelist
" call Decho("append filename<"a:fname."> to local
markfilelist_".curbufnr."<".string(s:netrwmarkfilelist_{curbufnr}).">")
call add(s:netrwmarkfilelist_{curbufnr},a:fname)
let s:netrwmarkfilemtch_{curbufnr}=
s:netrwmarkfilemtch_{curbufnr}.\|<'escape(a:fname,g:netrw_markfileesc.''''.g:netrw_markfileesc.'''').\>'

else
" remove filename from buffer's markfilelist
" call Decho("remove filename<"a:fname."> from local
markfilelist_".curbufnr."<".string(s:netrwmarkfilelist_{curbufnr}).">")
call filter(s:netrwmarkfilelist_{curbufnr},'v:val != a:fname')
if s:netrwmarkfilelist_{curbufnr} == []
" local markfilelist is empty; remove it entirely
" call Decho("markfile list now empty")
call s:NetrwUnmarkList(curbufnr,curdir)
else
" rebuild match list to display markings correctly
" call Decho("rebuild s:netrwmarkfilemtch_".curbufnr)
let s:netrwmarkfilemtch_{curbufnr}= ""
let first = 1
for fname in s:netrwmarkfilelist_{curbufnr}
if first
let s:netrwmarkfilemtch_{curbufnr}=
s:netrwmarkfilemtch_{curbufnr}.\|<'escape(fname,g:netrw_markfileesc.''''.g:netrw_markfileesc.'''').\>'
else
let s:netrwmarkfilemtch_{curbufnr}=
s:netrwmarkfilemtch_{curbufnr}.\|<'escape(fname,g:netrw_markfileesc.''''.g:netrw_markfileesc.'''').\>'
endif
let first= 0

```

```

    endfor
"   call Decho("ending s:netrwmarkfilelist_"curbufnr."<"string(s:netrwmarkfilelist_{curbufnr}).">")
"   call Decho("ending s:netrwmarkfilemtch_"curbufnr."<"s:netrwmarkfilemtch_{curbufnr}.">")
    endif
endif

else
" initialize new markfilelist

" call Decho("add fname<"a:fname."> to new markfilelist_"curbufnr)
let s:netrwmarkfilelist_{curbufnr}= []
call add(s:netrwmarkfilelist_{curbufnr},a:fname)
" call Decho("ending s:netrwmarkfilelist_"curbufnr"<"string(s:netrwmarkfilelist_{curbufnr}).">")

" build initial markfile matching pattern
if a:fname =~ '/'$'
    let s:netrwmarkfilemtch_{curbufnr}= '\<'escape(a:fname,g:netrw_markfileesc)
else
    let s:netrwmarkfilemtch_{curbufnr}= '\<'escape(a:fname,g:netrw_markfileesc).\>'
endif
" call Decho("ending s:netrwmarkfilemtch_"curbufnr."<"s:netrwmarkfilemtch_{curbufnr}.">")
endif

" handle global markfilelist
if exists("s:netrwmarkfilelist")
    let dname= s:ComposePath(b:netrw_curdir,a:fname)
    if index(s:netrwmarkfilelist,dname) == -1
        " append new filename to global markfilelist
        call add(s:netrwmarkfilelist,s:ComposePath(b:netrw_curdir,a:fname))
    " call Decho("append filename<"a:fname."> to global markfilelist<"string(s:netrwmarkfilelist).">")
    else
        " remove new filename from global markfilelist
    " call Decho("filter("string(s:netrwmarkfilelist)."v:val != '"dname."")")
    call filter(s:netrwmarkfilelist,'v:val != '"dname."")
    " call Decho("ending s:netrwmarkfilelist <"string(s:netrwmarkfilelist).">")
    if s:netrwmarkfilelist == []
        unlet s:netrwmarkfilelist
    endif
endif
else
" initialize new global-directory markfilelist
let s:netrwmarkfilelist= []
call add(s:netrwmarkfilelist,s:ComposePath(b:netrw_curdir,a:fname))
" call
Decho("init s:netrwmarkfilelist<"string(s:netrwmarkfilelist).">")
endif

" set up 2match'ing to netrwmarkfilemtch list

```

```

if exists("s:netrwmarkfilemtch_{curbufnr}") && s:netrwmarkfilemtch_{curbufnr} != ""
" call Decho("exe 2match netrwMarkFile /".s:netrwmarkfilemtch_{curbufnr}."/")
exe "2match netrwMarkFile /".s:netrwmarkfilemtch_{curbufnr}."/"
else
" call Decho("2match none")
2match none
endif
" call Dret("s:NetrwMarkFile : netrwmarkfilelist_{curbufnr}<".(exists("s:netrwmarkfilelist_{curbufnr}")?
string(s:netrwmarkfilelist_{curbufnr}) : " doesn't exist").">")
endfun

" -----
" s:NetrwMarkFileCompress: (invoked by mz) This function is used to {{2
" compress/decompress files using the programs
" in g:netrw_compress and g:netrw_uncompress,
" using g:netrw_compress_suffix to know which to
"
do. By default:
" g:netrw_compress = "gzip"
" g:netrw_decompress = { ".gz" : "gunzip" , ".bz2" : "bunzip2" , ".zip" : "unzip" , ".tar" : "tar -
xf" }
fun! s:NetrwMarkFileCompress(islocal)
" call Dfunc("s:NetrwMarkFileCompress(islocal=".a:islocal.")")
let svpos = netrw#NetrwSavePosn()
let curdir = b:netrw_curdir
let curbufnr = bufnr("%")

if exists("s:netrwmarkfilelist_{curbufnr}") && exists("g:netrw_compress") && exists("g:netrw_decompress")
for fname in s:netrwmarkfilelist_{curbufnr}
" for every filename in the marked list
for sfx in sort(keys(g:netrw_decompress))
if fname =~ '\.sfx.$'
" fname has a suffix indicating that its compressed; apply associated decompression routine
let exe= s:WinPath(g:netrw_decompress[sfx])
" call Decho("fname<".fname."> is compressed so decompress with <".exe.">")
if a:islocal
if g:netrw_keepdir
let
fname= shellescape(s:ComposePath(curdir,fname))
endif
else
let fname= shellescape(b:netrw_curdir.fname,1)
endif
if executable(exe)
if a:islocal
call system(exe." ".fname)
else
call s:RemoteSystem(exe." ".fname)

```

```

endif
else
  call netrw#ErrorMsg(s:WARNING,"unable to apply<".exe."> to file<".fname.">",50)
endif
break
endif
endfor
if exists("exe")
  unlet exe
elseif a:islocal
  " fname not a compressed file, so compress it
  call system(s:WinPath(g:netrw_compress)." ".shellescape(s:ComposePath(b:netrw_curdir,fname)))
else
  " fname not a compressed file, so compress it
  call s:RemoteSystem(s:WinPath(g:netrw_compress)." ".shellescape(fname))
endif
endfor
call s:NetrwUnmarkList(curbufnr,curdir)
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'/'))
call netrw#NetrwRestorePosn(svpos)
endif
" call Dret("s:NetrwMarkFileCompress")
endfun

"
-----
" s:NetrwMarkFileCopy: (invoked by mc) copy marked files to target {{{2
"       If no marked files, then set up directory as the
"       target. Currently does not support copying entire
"       directories. Uses the local-buffer marked file list.
"       Returns 1=success (used by NetrwMarkFileMove())
"       0=failure
fun! s:NetrwMarkFileCopy(islocal)
" call Dfunc("s:NetrwMarkFileCopy(islocal=" .a:islocal.") target<".(exists("s:netrwmtgt")? s:netrwmtgt : '---').">")

" sanity checks
if !exists("s:netrwmarkfilelist_{bufnr('%')}") || empty(s:netrwmarkfilelist_{bufnr('%')})
  call netrw#ErrorMsg(2,"there are no marked files in this window (:help netrw-mf)",66)
" call Dret("s:NetrwMarkFileCopy 0")
  return 0
endif
" call Decho("sanity chk passed: s:netrwmarkfilelist_".bufnr('%').".<".string(s:netrwmarkfilelist_{bufnr('%')})
if !exists("s:netrwmtgt")
  call netrw#ErrorMsg(2,"your marked file target is empty! (:help netrw-mt)",67)
" call Dret("s:NetrwMarkFileCopy 0")
  return 0
endif
" call Decho("sanity chk passed: s:netrwmtgt<".s:netrwmtgt.">")

```

```

let curdir = b:netrw_curdir
let curbufnr = bufnr("%")

if a:islocal && s:netrwmtgt_islocal
" Copy marked files, local directory to local directory
" call Decho("copy from local to local")
let args= join(map(deepcopy(s:netrwmarkfilelist_{bufnr('%')}),"shellescape(b:netrw_curdir.\\"^\".v:val)"))
" call Decho("system(\".g:netrw_localcopycmd.\" ".args." ".shellescape(s:netrwmtgt).")")
call system(s:WinPath(g:netrw_localcopycmd)." ".args." ".shellescape(s:netrwmtgt))

elseif a:islocal && !s:netrwmtgt_islocal
" Copy marked files, local directory to remote directory
" call Decho("copy from local to remote")
call s:NetrwUpload(s:netrwmarkfilelist_{bufnr('%')},s:netrwmtgt)

elseif !a:islocal && s:netrwmtgt_islocal
" call Decho("copy from remote to local")
call netrw#NetrwObtain(a:islocal,s:netrwmarkfilelist_{bufnr('%')},s:netrwmtgt)

elseif !a:islocal && !s:netrwmtgt_islocal
" call Decho("copy from remote to remote")
let curdir = getcwd()
let tmpdir = s:GetTempfile("")
if tmpdir !~ '/'
let tmpdir= curdir."/".tmpdir
endif
if exists("*mkdir")
call mkdir(tmpdir)
else
exe "silent! !".g:netrw_local_mkdir.' '.shellescape(tmpdir,1)
endif
if isdirectory(tmpdir)
exe "keepjumps lcd ".fnameescape(tmpdir)
call netrw#NetrwObtain(a:islocal,s:netrwmarkfilelist_{bufnr('%')},tmpdir)
let localfiles= map(deepcopy(s:netrwmarkfilelist_{bufnr('%')}),'substitute(v:val,"^.*"/","","")')
call s:NetrwUpload(localfiles,s:netrwmtgt)
if getcwd() == tmpdir
for fname in s:netrwmarkfilelist_{bufnr('%')}
call s:NetrwDelete(fname)
endfor
exe "keepjumps
lcd ".fnameescape(curdir)
exe "silent! !".g:netrw_local_rmdir." ".shellescape(tmpdir,1)
else
exe "keepjumps lcd ".fnameescape(curdir)
endif
endif
endif
endif

```

```

" -----
" cleanup
" -----
" call Decho("cleanup")

" remove markings from local buffer
call s:NetrwUnmarkList(curbufnr,curdir)

" refresh buffers
if !s:netrwmftgt_islocal
  call s:NetrwRefreshDir(s:netrwmftgt_islocal,s:netrwmftgt)
endif
if a:islocal
  call s:NetrwRefreshDir(a:islocal,b:netrw_curdir)
endif
if g:netrw_fastbrowse <= 1
  call s:LocalBrowseShellCmdRefresh()
endif

" call Dret("s:NetrwMarkFileCopy 1")
return 1
endfun

" -----
" s:NetrwMarkFileDiff: (invoked by md) This function is used to {{{2
"      invoke vim's diff mode on the marked files.
"      Either two or three files can be so handled.
"      Uses the global marked
file list.
fun! s:NetrwMarkFileDiff(islocal)
" call Dfunc("s:NetrwMarkFileDiff(islocal=" .a:islocal.") b:netrw_curdir<" .b:netrw_curdir.">")
let curbufnr= bufnr("%")

if exists("s:netrwmarkfilelist_{curbufnr}")
  let cnt = 0
  let curdir = b:netrw_curdir
  for fname in s:netrwmarkfilelist
    let cnt= cnt + 1
    if cnt == 1
"   call Decho("diffthis: fname<".fname.">")
      exe "e ".fnameescape(fname)
      diffthis
    elseif cnt == 2 || cnt == 3
      vsplit
      wincmd l
"   call Decho("diffthis: ".fname)
      exe "e ".fnameescape(fname)

```

```

diffthis
else
break
endif
endfor
call s:NetrwUnmarkList(curbufnr,curdir)
endif

" call Dret("s:NetrwMarkFileDiff")
endfun

" -----
" s:NetrwMarkFileEdit: (invoked by me) put marked files on arg list and start editing them {{{2
"         Uses global markfilelist
fun! s:NetrwMarkFileEdit(islocal)
" call
Dfunc("s:NetrwMarkFileEdit(islocal=".a:islocal.")")

let curdir = b:netrw_curdir
let curbufnr = bufnr("%")
if exists("s:netrwmarkfilelist_{curbufnr}")
call s:SetRexDir(a:islocal,curdir)
let flist= join(map(deepcopy(s:netrwmarkfilelist), "fnameescape(v:val)"))
" unmark markedfile list
" call s:NetrwUnmarkList(curbufnr,curdir)
call s:NetrwUnmarkAll()
" call Decho("exe silent args ".flist)
exe "silent args ".flist
endif

" call Dret("s:NetrwMarkFileEdit")
endfun

" -----
" s:NetrwMarkFileExe: (invoked by mx) execute arbitrary command on marked files, one at a time {{{2
"         Uses the local marked-file list.
fun! s:NetrwMarkFileExe(islocal)
" call Dfunc("s:NetrwMarkFileExe(islocal=".a:islocal.")")
let svpos = netrw#NetrwSavePosn()
let curdir = b:netrw_curdir
let curbufnr = bufnr("%")

if exists("s:netrwmarkfilelist_{curbufnr}")
" get
the command
call inputsave()
let cmd= input("Enter command: ", "", "file")
call inputrestore()

```



```

" call Decho("cmd<".cmd.">")

" apply command to marked files. Substitute: filename -> %
" If no %, then append a space and the filename to the command
for fname in s:netrwmarkfilelist_{curbufnr}
if a:islocal
if g:netrw_keepdir
let fname= shellescape(s:WinPath(s:ComposePath(curdir,fname)))
endif
else
let fname= shellescape(s:WinPath(b:netrw_curdir.fname))
endif
if cmd =~ '%'
let xcmd= substitute(cmd,'% ',fname,'g')
else
let xcmd= cmd.' '.fname
endif
if a:islocal
" call Decho("local: xcmd<".xcmd.">")
let ret= system(xcmd)
else
" call Decho("remote: xcmd<".xcmd.">")
let ret= s:RemoteSystem(xcmd)
endif
if v:shell_error < 0
call netrw#ErrorMsg(s:ERROR,"command<".xcmd."> failed, aborting",54)
break
else
echo ret
endif
endifor

" unmark marked file list
call s:NetrwUnmarkList(curbufnr,curdir)

" refresh the listing
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'/'))
call netrw#NetrwRestorePosn(svpos)
else
call netrw#ErrorMsg(s:ERROR,"no files marked!",59)
endif

" call Dret("s:NetrwMarkFileExe")
endfun

" -----
" s:NetrwMarkHideSfx: (invoked by mh) (un)hide files having same suffix

```

```

"          as the marked file(s) (toggles suffix presence)
"          Uses the local marked file list.
fun! s:NetrwMarkHideSfx(islocal)
" call Dfunc("s:NetrwMarkHideSfx(islocal=".a:islocal.")")
let svpos = netrw#NetrwSavePosn()
let curbufnr = bufnr("%")

" s:netrwmarkfilelist_{curbufnr}: the List of marked files
if exists("s:netrwmarkfilelist_{curbufnr}")

  for fname in s:netrwmarkfilelist_{curbufnr}
"   call Decho("s:NetrwMarkFileCopy: fname<".fname.">")
"   construct suffix
pattern
  if fname =~ \.
    let sfxpat= "^.*.".substitute(fname, '^\(\.[^ ]+\)$', '1', '')
  else
    let sfxpat= '^\%(\%(\.\)\@!\.)*$'
  endif
" determine if its in the hiding list or not
let inhidelist= 0
if g:netrw_list_hide != ""
  let itemnum = 0
  let hidelist= split(g:netrw_list_hide, ',')
  for hidepat in hidelist
    if sfxpat == hidepat
      let inhidelist= 1
      break
    endif
    let itemnum= itemnum + 1
  endfor
endif
" call Decho("fname<".fname."> inhidelist=".inhidelist." sfxpat<".sfxpat.">")
if inhidelist
  " remove sfxpat from list
  call remove(hidelist, itemnum)
  let g:netrw_list_hide= join(hidelist, ',')
elseif g:netrw_list_hide != ""
  " append sfxpat to non-empty list
  let g:netrw_list_hide= g:netrw_list_hide.", ".sfxpat
else
  " set hiding list to sfxpat
  let g:netrw_list_hide= sfxpat
endif
endif
endfor

"

```

```

refresh the listing
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'/'))
call netrw#NetrwRestorePosn(svpos)
else
call netrw#ErrorMsg(s:ERROR,"no files marked!",59)
endif

" call Dret("s:NetrwMarkHideSfx")
endfun

" -----
" s:NetrwMarkFileGrep: (invoked by mg) This function applies vimgrep to marked files {{{2
"     Uses the global markfilelist
fun! s:NetrwMarkFileGrep(islocal)
" call Dfunc("s:NetrwMarkFileGrep(islocal=".a:islocal.")")
let svpos = netrw#NetrwSavePosn()
let curbufnr = bufnr("%")

if exists("s:netrwmarkfilelist")
" call Decho("s:netrwmarkfilelist".string(s:netrwmarkfilelist).">")
let netrwmarkfilelist= join(map(deepcopy(s:netrwmarkfilelist), "fnameescape(v:val)"))
call s:NetrwUnmarkAll()

" ask user for pattern
call inputsave()
let pat= input("Enter pattern: ", "")
call inputrestore()
if pat !~ '\s'
if
pat !~ '^/'
let pat= '/.pat.'
endif
let pat= ".pat"
endif

" use vimgrep for both local and remote
" call Decho("exe vimgrep".pat." ".netrwmarkfilelist)
exe "vimgrep".pat." ".netrwmarkfilelist

2match none
call netrw#NetrwRestorePosn(svpos)
endif

" call Dret("s:NetrwMarkFileGrep")
endfun

" -----
" s:NetrwMarkFileMove: (invoked by mm) execute arbitrary command on marked files, one at a time {{{2

```

```

"          uses the global marked file list
"          s:netrwmfloc= 0: target directory is remote
"          = 1: target directory is local
fun! s:NetrwMarkFileMove(islocal)
" call Dfunc("s:NetrwMarkFileMove(islocal=".a:islocal.")")
let curdir = b:netrw_curdir
let curbufnr = bufnr("%")

" sanity check
if !exists("s:netrwmarkfilelist_{bufnr('%')}") || empty(s:netrwmarkfilelist_{bufnr('%')})
  call netrw#ErrorMsg(2,"there
are no marked files in this window (:help netrw-mf)",66)
" call Dret("s:NetrwMarkFileMove")
  return
endif
" call Decho("sanity chk passed: s:netrwmarkfilelist_".bufnr('%')."<".string(s:netrwmarkfilelist_{bufnr('%')}))
if !exists("s:netrwmtgt")
  call netrw#ErrorMsg(2,"your marked file target is empty! (:help netrw-mt)",67)
" call Dret("s:NetrwMarkFileCopy 0")
  return 0
endif
" call Decho("sanity chk passed: s:netrwmtgt<".s:netrwmtgt.">")

if a:islocal && s:netrwmtgt_islocal
" move: local -> local
" call Decho("move from local to local")
" call Decho("(s:NetrwMarkFileMove) local to local move")
if executable(g:netrw_localmovecmd)
  for fname in s:netrwmarkfilelist_{bufnr("%")}
" call Decho("system(".g:netrw_localmovecmd." ".shellescape(fname)." ".shellescape(s:netrwmtgt).)")")
  let ret= system(g:netrw_localmovecmd." ".shellescape(fname)." ".shellescape(s:netrwmtgt))
  if v:shell_error < 0
    call
netrw#ErrorMsg(s:ERROR,"command<".g:netrw_localmovecmd."> failed, aborting",54)
    break
  endif
endifor
else
  call netrw#ErrorMsg(s:ERROR,"command<".g:netrw_localmovecmd."> is not executable!",57)
endif

elseif a:islocal && !s:netrwmtgt_islocal
" move: local -> remote
" call Decho("move from local to remote")
" call Decho("copy")
let mflist= s:netrwmarkfilelist_{bufnr("%")}
call s:NetrwMarkFileCopy(a:islocal)
" call Decho("remove")

```

```

for fname in mflist
  let barefname = substitute(fname, '^(\.*^)\(.{-}\)$', '\2,')
  let ok      = s:NetrwLocalRmFile(b:netrw_curdir,barefname,1)
endfor
unlet mflist

elseif !a:islocal && s:netrwmtgt_islocal
  " move: remote -> local
  " call Decho("move from remote to local")
  " call Decho("copy")
  let mflist= s:netrwmarkfilelist_{bufnr("%")}
  call s:NetrwMarkFileCopy(a:islocal)
  " call Decho("remove")
  for fname in mflist
    let barefname = substitute(fname, '^(\.*^)\(.{-}\)$', '\2,')
    let ok      = s:NetrwRemoteRmFile(b:netrw_curdir,barefname,1)
  endfor
  unlet mflist

elseif !a:islocal && !s:netrwmtgt_islocal
  " move: remote -> remote
  " call Decho("move from remote to remote")
  " call Decho("copy")
  let mflist= s:netrwmarkfilelist_{bufnr("%")}
  call s:NetrwMarkFileCopy(a:islocal)
  " call Decho("remove")
  for fname in mflist
    let barefname = substitute(fname, '^(\.*^)\(.{-}\)$', '\2,')
    let ok      = s:NetrwRemoteRmFile(b:netrw_curdir,barefname,1)
  endfor
  unlet mflist
endif

" -----
" cleanup
" -----
" call Decho("cleanup")

" remove markings from local buffer
call s:NetrwUnmarkList(curbufnr,curdir)          " remove markings from local buffer

" refresh buffers
if !s:netrwmtgt_islocal
  call s:NetrwRefreshDir(s:netrwmtgt_islocal,s:netrwmtgt)
endif
if a:islocal
  call s:NetrwRefreshDir(a:islocal,b:netrw_curdir)
endif

```

```

if g:netrw_fastbrowse
<= 1
  call s:LocalBrowseShellCmdRefresh()
endif

" call Dret("s:NetrwMarkFileMove")
endfun

" -----
" s:NetrwMarkFilePrint: (invoked by mp) This function prints marked files {{{2
"         using the hardcopy command. Local marked-file list only.
fun! s:NetrwMarkFilePrint(islocal)
" call Dfunc("s:NetrwMarkFilePrint(islocal=".a:islocal.")")
let curbufnr= bufnr("%")
if exists("s:netrwmarkfilelist_{curbufnr}")
let netrwmarkfilelist = s:netrwmarkfilelist_{curbufnr}
let curdir      = b:netrw_curdir
call s:NetrwUnmarkList(curbufnr,curdir)
for fname in netrwmarkfilelist
if a:islocal
if g:netrw_keepdir
let fname= s:ComposePath(curdir,fname)
endif
else
let fname= curdir.fname
endif
1split
" the autocmds will handle both local and remote files
" call Decho("exe silent e ".escape(fname,' '))
exe "silent
e ".fnameescape(fname)
" call Decho("hardcopy")
hardcopy
q
endifor
2match none
endif
" call Dret("s:NetrwMarkFilePrint")
endfun

" -----
" s:NetrwMarkFileRegexp: (invoked by mr) This function is used to mark {{{2
"         files when given a regexp (for which a prompt is
"         issued).
fun! s:NetrwMarkFileRegexp(islocal)
" call Dfunc("s:NetrwMarkFileRegexp(islocal=".a:islocal.")")

" get the regular expression

```

```

call inputsave()
let regexp= input("Enter regexp: ", "", "file")
call inputrestore()

if a:islocal
" get the matching list of files using local glob()
" call Decho("handle local regexp")
let dirname = escape(b:netrw_curdir,g:netrw_glob_escape)
let filelist = glob(s:ComposePath(dirname,regexp))
if filelist != ""
let filelist= filelist."\n"
endif

" mark the list of files
while filelist != ""

if filelist =~ '\n'
let filename = substitute(filelist, '\n.*$', '', 'e')
let filelist = substitute(filelist, '^.\{-}\n(.*)$', '\1', 'e')
else
let filename = filelist
let filelist = ""
endif
" call Decho("filelist<".filelist.">")
" call Decho("filename<".filename.">")
call s:NetrwMarkFile(a:islocal,substitute(filename, '^.*\/', ''))
endwhile

else
" call Decho("handle remote regexp")

" convert displayed listing into a filelist
let eikp = &ei
let areg = @a
silent %y a
set ei=all ma
" call Decho("set ei=all ma")
1split
enew
silent norm! "ap
2
let bannercnt= search('^" =====', 'W')
exe "silent 1, ".bannercnt."d"
set bt=nofile
if g:netrw_liststyle == s:LONGLIST
silent %s\s\{2,\}S.*$/e
elseif g:netrw_liststyle == s:WIDELIST
silent %s\s\{2,\}/r/ge

```

```

elseif g:netrw_liststyle == s:TREELIST
  silent %s/^|//e
  silent! g/^.*$/d
endif
" convert regexp into
the more usual glob-style format
let regexp= substitute(regexp,'*','*',g')
" call Decho("regexp<".regexp.">")
exe "silent! v/" .escape(regexp, '/') ."/d"
let filelist= getline(1,line("$"))
q!
for filename in filelist
  call s:NetrwMarkFile(a:islocal,substitute(filename,'^.*/',","))
endfor
unlet filelist
let @a = areg
let &ei = eikkeep
endif

" call Dret("s:NetrwMarkFileRegexp")
endfun

" -----
" s:NetrwMarkFileSource: (invoked by ms) This function sources marked files {{{2
"           Uses the local marked file list.
fun! s:NetrwMarkFileSource(islocal)
" call Dfunc("s:NetrwMarkFileSource(islocal=".a:islocal.")")
let curbufnr= bufnr("%")
if exists("s:netrwmarkfilelist_{curbufnr}")
  let netrwmarkfilelist = s:netrwmarkfilelist_{bufnr("%")}
  let curdir      = b:netrw_curdir
  call s:NetrwUnmarkList(curbufnr,curdir)
  for fname in netrwmarkfilelist
    if a:islocal
      if g:netrw_keepdir
        let fname= s:ComposePath(curdir,fname)
      endif
    else
      let fname= curdir.fname
    endif
    " the autocmds will handle sourcing both local and remote files
    " call Decho("exe so ".fnameescape(fname))
    exe "so ".fnameescape(fname)
  endfor
  2match none
endif
" call Dret("s:NetrwMarkFileSource")
endfun

```



```

" -----
" s:NetrwMarkFileTag: (invoked by mT) This function applies g:netrw_ctags to marked files {{{2
"     Uses the global markfilelist
fun! s:NetrwMarkFileTag(islocal)
" call Dfunc("s:NetrwMarkFileTag(islocal=".a:islocal.")")
let svpos = netrw#NetrwSavePosn()
let curdir = b:netrw_curdir
let curbufnr = bufnr("%")

if exists("s:netrwmarkfilelist")
" call Decho("s:netrwmarkfilelist.string(s:netrwmarkfilelist.">")
let netrwmarkfilelist= join(map(deepcopy(s:netrwmarkfilelist), "shellescape(v:val, '!a:islocal.'"))
call s:NetrwUnmarkAll()

if a:islocal
if executable(g:netrw_ctags)
" call Decho("call system('.g:netrw_ctags.' ".netrwmarkfilelist.")")
call system(g:netrw_ctags." ".netrwmarkfilelist)
else
call netrw#ErrorMsg(s:ERROR,"g:netrw_ctags<".g:netrw_ctags."> is not executable!",51)
endif
else
let cmd = s:RemoteSystem(g:netrw_ctags." ".netrwmarkfilelist)
call netrw#NetrwObtain(a:islocal,"tags")
let curdir= b:netrw_curdir
1split
e tags
let path= substitute(curdir,'^\(.*\)\/[^\]*$','\1/',")
" call Decho("curdir<".curdir."> path<".path.">")
exe '%s\t(\S+)\t\t'.escape(path,"\\n\\r\\").'\1\t/e'
wq!
endif
2match none
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'./'))
call netrw#NetrwRestorePosn(svpos)
endif

" call Dret("s:NetrwMarkFileTag")
endfun

```

```

" -----
" s:NetrwMarkFileTgt:
" (invoked by mt) This function sets up a marked file target {{{2
" Sets up two variables,
" s:netrwmtgt : holds the target directory
" s:netrwmtgt_islocal : 0=target directory is remote
"     1=target directory is local

```

```

fun! s:NetrwMarkFileTgt(islocal)
" call Dfunc("s:NetrwMarkFileTgt(islocal=".a:islocal.")")
let svpos = netrw#NetrwSavePosn()
let curdir = b:netrw_curdir
let hadtgt = exists("s:netrwmtgt")
if !exists("w:netrw_bannercnt")
  let w:netrw_bannercnt= b:netrw_bannercnt
endif

" set up target
if line(".") < w:netrw_bannercnt
  " if cursor in banner region, use b:netrw_curdir for the target
  let s:netrwmtgt= b:netrw_curdir
" call Decho("inbanner: s:netrwmtgt<".s:netrwmtgt.">")

else
  " get word under cursor.
  " * If directory, use it for the target.
  " * If file, use b:netrw_curdir for the target
  let curword= s:NetrwGetWord()
  let tgtDir = s:ComposePath(curdir,curword)
  if a:islocal
    && isdirectory(tgtDir)
    let s:netrwmtgt = tgtDir
  " call Decho("local isdir: s:netrwmtgt<".s:netrwmtgt.">")
  elseif !a:islocal && tgtDir =~ '/'$
    let s:netrwmtgt = tgtDir
  " call Decho("remote isdir: s:netrwmtgt<".s:netrwmtgt.">")
  else
    let s:netrwmtgt = curdir
  " call Decho("isfile: s:netrwmtgt<".s:netrwmtgt.">")
  endif
endif
if a:islocal
  " simplify the target (eg. /abc/def/./ghi -> /abc/ghi)
  let s:netrwmtgt= simplify(s:netrwmtgt)
  " call Decho("simplify: s:netrwmtgt<".s:netrwmtgt.">")
endif
if g:netrw_cygwin
  let s:netrwmtgt= substitute(system("cygpath ".shellescape(s:netrwmtgt)),'\n$',",")
  let s:netrwmtgt= substitute(s:netrwmtgt,'\n$',",")
endif
let s:netrwmtgt_islocal= a:islocal

if g:netrw_fastbrowse <= 1
  call s:LocalBrowseShellCmdRefresh()
endif
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,./))

```

```

call netrw#NetrwRestorePosn(svpos)
if !hadtgt
  norm!
j
endif

" call Dret("s:NetrwMarkFileTgt : netrwmfgt<".(exists("s:netrwmfgt")? s:netrwmfgt : "").">")
endfun

" -----
" s:NetrwOpenFile: query user for a filename and open it {{{2
fun! s:NetrwOpenFile(islocal)
" call Dfunc("s:NetrwOpenFile(islocal=".a:islocal.")")
call inputsave()
let fname= input("Enter filename: ")
call inputrestore()
if fname !~ '[\\]'
  if exists("b:netrw_curdir")
    if exists("g:netrw_quiet")
      let netrw_quiet_keep = g:netrw_quiet
    endif
    let g:netrw_quiet = 1
    if b:netrw_curdir =~ '/'$
      exe "e ".fnameescape(b:netrw_curdir.fname)
    else
      exe "e ".fnameescape(b:netrw_curdir."".fname)
    endif
    if exists("netrw_quiet_keep")
      let g:netrw_quiet= netrw_quiet_keep
    else
      unlet g:netrw_quiet
    endif
  endif
else
  exe "e ".fnameescape(fname)
endif
" call Dret("s:NetrwOpenFile")
endfun

" -----
"
" s:NetrwUnmarkList: delete local marked file lists and remove their contents from the global marked-file list {{{2
fun! s:NetrwUnmarkList(curbufnr,curdir)
" call Dfunc("s:NetrwUnmarkList(curbufnr=".a:curbufnr." curdir<".a:curdir.">")")

" remove all files in local marked-file list from global list
if exists("s:netrwmarkfilelist_{a:curbufnr}")
  for mfile in s:netrwmarkfilelist_{a:curbufnr}

```

```

let dfile = s:ComposePath(a:curdir,mfile)    " prepend directory to mfile
let idx  = index(s:netrwmarkfilelist,dfile)  " get index in list of dfile
call remove(s:netrwmarkfilelist,idx)        " remove from global list
endfor
if s:netrwmarkfilelist == []
  unlet s:netrwmarkfilelist
endif

" getting rid of the local marked-file lists is easy
unlet s:netrwmarkfilelist_{a:curbufnr}
endif
if exists("s:netrwmarkfilemtch_{a:curbufnr}")
  unlet s:netrwmarkfilemtch_{a:curbufnr}
endif
2match none
" call Dret("s:NetrwUnmarkList")
endfun

" -----
" s:NetrwUnmarkAll: remove the global marked file list and all local ones {{{2
fun! s:NetrwUnmarkAll()
" call Dfunc("s:NetrwUnmarkAll()")
if exists("s:netrwmarkfilelist")
  unlet s:netrwmarkfilelist
endif
silent call s:NetrwUnmarkAll2()
2match none
" call Dret("s:NetrwUnmarkAll")
endfun

" -----
" s:NetrwUnmarkAll2: {{{2
fun! s:NetrwUnmarkAll2()
" call Dfunc("s:NetrwUnmarkAll2()")
redir => netrwmarkfilelist_let
let
redir END
let netrwmarkfilelist_list= split(netrwmarkfilelist_let,"\n")    " convert let string into a let list
call filter(netrwmarkfilelist_list,"v:val =~ '^s:netrwmarkfilelist_'" " retain only those vars that start as
s:netrwmarkfilelist_
call map(netrwmarkfilelist_list,"substitute(v:val, '\\s.*$',','')") " remove what the
entries are equal to
for flist in netrwmarkfilelist_list
  let curbufnr= substitute(flist,'s:netrwmarkfilelist_',','')
  unlet s:netrwmarkfilelist_{curbufnr}
  unlet s:netrwmarkfilemtch_{curbufnr}
endfor
" call Dret("s:NetrwUnmarkAll2")

```

```

endfun

" -----
" s:NetrwUnMarkFile: {{{2
fun! s:NetrwUnMarkFile(islocal)
" call Dfunc("s:NetrwUnMarkFile(islocal=".a:islocal.")")
let svpos = netrw#NetrwSavePosn()
let curbufnr = bufnr("%")

" unmark marked file list (although I expect s:NetrwUpload()
" to do it, I'm just making sure)
if exists("s:netrwmarkfilelist_{bufnr('%')}")
" call Decho("unlet'ing: s:netrwmarkfile[list[mtch]_".bufnr("%"))
unlet s:netrwmarkfilelist
unlet s:netrwmarkfilelist_{curbufnr}
unlet s:netrwmarkfilemtch_{curbufnr}
2match none
endif

" call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'./'))
call netrw#NetrwRestorePosn(svpos)
" call
Dret("s:NetrwUnMarkFile")
endfun

" -----
" s:NetrwMenu: generates the menu for gvim and netrw {{{2
fun! s:NetrwMenu(domenu)

if !exists("g:NetrwMenuPriority")
let g:NetrwMenuPriority= 80
endif

if has("menu") && has("gui_running") && &go =~ 'm' && g:netrw_menu
" call Dfunc("NetrwMenu(domenu=".a:domenu.")")

if !exists("s:netrw_menu_enabled") && a:domenu
" call Decho("initialize menu")
let s:netrw_menu_enabled= 1
exe 'silent! menu '.g:NetrwMenuPriority.'.1 '.g:NetrwTopLvlMenu.'Help<tab><F1> <F1>'
exe 'silent! menu '.g:NetrwMenuPriority.'.5 '.g:NetrwTopLvlMenu.'-Sep1- :'
exe 'silent! menu '.g:NetrwMenuPriority.'.6 '.g:NetrwTopLvlMenu.'Go\ Up\ Directory<tab>- -'
exe 'silent! menu '.g:NetrwMenuPriority.'.7 '.g:NetrwTopLvlMenu.'Apply\ Special\ Viewer<tab>x x'
exe 'silent! menu '.g:NetrwMenuPriority.'.8.1 '.g:NetrwTopLvlMenu.'Bookmarks\ and\ History.Bookmark\
Current\ Directory<tab>mb mb'
exe 'silent! menu '.g:NetrwMenuPriority.'.8.4 '.g:NetrwTopLvlMenu.'Bookmarks\ and\ History.Goto\ Prev\ Dir\
(History)<tab>u u'
exe 'silent! menu '.g:NetrwMenuPriority.'.8.5 '.g:NetrwTopLvlMenu.'Bookmarks\ and\ History.Goto\ Next\ Dir\

```

```

(History)<tab>U U'
  exe 'silent! menu '.g:NetrwMenuPriority.'.8.6 '.g:NetrwTopLvlMenu.'Bookmarks\ and\ History.List<tab>qb qb'
  exe 'silent! menu '.g:NetrwMenuPriority.'.9.1 '.g:NetrwTopLvlMenu.'Browsing\ Control.Edit\ File\ Hiding\
List<tab><ctrl-h>.'" \<c-h>"
  exe 'silent! menu '.g:NetrwMenuPriority.'.9.2 '.g:NetrwTopLvlMenu.'Browsing\ Control.Edit\ Sorting\
Sequence<tab>S S'
  exe 'silent! menu '.g:NetrwMenuPriority.'.9.3 '.g:NetrwTopLvlMenu.'Browsing\ Control.Quick\ Hide/Unhide\
Dot\ Files<tab>.'" gh gh"
  exe 'silent! menu '.g:NetrwMenuPriority.'.9.4 '.g:NetrwTopLvlMenu.'Browsing\ Control.Refresh\
Listing<tab>.'"<ctrl-l> \<c-l>"
  exe 'silent! menu '.g:NetrwMenuPriority.'.9.5
'.g:NetrwTopLvlMenu.'Browsing\ Control.Settings/Options<tab>:NetrwSettings '.':NetrwSettings\<cr>"
  exe 'silent! menu '.g:NetrwMenuPriority.'.10 '.g:NetrwTopLvlMenu.'Delete\ File/Directory<tab>D D'
  exe 'silent! menu '.g:NetrwMenuPriority.'.11.1 '.g:NetrwTopLvlMenu.'Edit\ File/Dir.In\ Current\
Window<tab><cr>.'" \<cr>"
  exe 'silent! menu '.g:NetrwMenuPriority.'.11.2 '.g:NetrwTopLvlMenu.'Edit\ File/Dir.Preview\
File/Directory<tab>p p'
  exe 'silent! menu '.g:NetrwMenuPriority.'.11.3 '.g:NetrwTopLvlMenu.'Edit\ File/Dir.In\ Previous\ Window<tab>P
P'
  exe 'silent! menu '.g:NetrwMenuPriority.'.11.4 '.g:NetrwTopLvlMenu.'Edit\ File/Dir.In\ New\ Window<tab>o o'
  exe 'silent! menu '.g:NetrwMenuPriority.'.11.5 '.g:NetrwTopLvlMenu.'Edit\ File/Dir.In\ New\ Vertical\
Window<tab>v v'
  exe 'silent! menu '.g:NetrwMenuPriority.'.12.1 '.g:NetrwTopLvlMenu.'Explore.Directory\ Name :Explore '
  exe 'silent! menu '.g:NetrwMenuPriority.'.12.2 '.g:NetrwTopLvlMenu.'Explore.Filenames\
Matching\ Pattern\ (curdir\ only)<tab>:Explore\ */ :Explore */'
  exe 'silent! menu '.g:NetrwMenuPriority.'.12.2 '.g:NetrwTopLvlMenu.'Explore.Filenames\ Matching\ Pattern\
(+subdirs)<tab>:Explore\ **/ :Explore **/'
  exe 'silent! menu '.g:NetrwMenuPriority.'.12.3 '.g:NetrwTopLvlMenu.'Explore.Files\ Containing\ Pattern\ (curdir\
only)<tab>:Explore\ **/ :Explore **/'
  exe 'silent! menu '.g:NetrwMenuPriority.'.12.4 '.g:NetrwTopLvlMenu.'Explore.Files\ Containing\ Pattern\
(+subdirs)<tab>:Explore\ **// :Explore **//'
  exe 'silent! menu '.g:NetrwMenuPriority.'.12.4 '.g:NetrwTopLvlMenu.'Explore.Next\ Match<tab>:Nexplore
:Nexplore<cr>'
```

```

exe 'silent! menu '.g:NetrwMenuPriority.'.14.9 '.g:NetrwTopLvlMenu.'Marked\ Files.Move\ To\ Target<tab>mm
mm'
exe 'silent! menu '.g:NetrwMenuPriority.'.14.10 '.g:NetrwTopLvlMenu.'Marked\ Files.Obtain<tab>O O'
exe 'silent! menu '.g:NetrwMenuPriority.'.14.11 '.g:NetrwTopLvlMenu.'Marked\ Files.Print<tab>mp mp'
exe 'silent! menu '.g:NetrwMenuPriority.'.14.12 '.g:NetrwTopLvlMenu.'Marked\ Files.Replace<tab>R R'
exe 'silent! menu '.g:NetrwMenuPriority.'.14.13 '.g:NetrwTopLvlMenu.'Marked\ Files.Set\ Target<tab>mt mt'
exe 'silent! menu '.g:NetrwMenuPriority.'.14.14 '.g:NetrwTopLvlMenu.'Marked\ Files.Tag<tab>mT mT'
exe 'silent! menu '.g:NetrwMenuPriority.'.14.15 '.g:NetrwTopLvlMenu.'Marked\
Files.Zip/Unzip/Compress/Uncompress<tab>mz mz'
exe 'silent! menu '.g:NetrwMenuPriority.'.15 '.g:NetrwTopLvlMenu.'Obtain\ File<tab>O O'
exe 'silent! menu '.g:NetrwMenuPriority.'.16.1 '.g:NetrwTopLvlMenu.'Style.Listing\ Style\ (thin-long-wide-
tree)<tab>i i'
exe 'silent! menu '.g:NetrwMenuPriority.'.16.2 '.g:NetrwTopLvlMenu.'Style.Normal-Hide-Show<tab>a a'
exe 'silent! menu '.g:NetrwMenuPriority.'.16.3 '.g:NetrwTopLvlMenu.'Style.Reverse\ Sorting\
Order<tab>.'r r"
exe 'silent! menu '.g:NetrwMenuPriority.'.16.4 '.g:NetrwTopLvlMenu.'Style.Sorting\ Method\ (name-time-
size)<tab>s s'
exe 'silent! menu '.g:NetrwMenuPriority.'.17 '.g:NetrwTopLvlMenu.'Rename\ File/Directory<tab>R R'
exe 'silent! menu '.g:NetrwMenuPriority.'.18 '.g:NetrwTopLvlMenu.'Set\ Current\ Directory<tab>c c'
call s:NetrwBookmarkMenu() " provide some history! uses priorities 2,3, reserves 4, 8.2.x
let s:netrw_menucnt= 28

elseif !a:domenu
let s:netrwcnt = 0
let curwin = winnr()
windo if getline(2) =~ "Netrw" | let s:netrwcnt= s:netrwcnt + 1 | endif
exe curwin."wincmd w"

if s:netrwcnt <= 1
" call Decho("clear menus")
exe 'silent! unmenu '.g:NetrwTopLvlMenu
" call Decho('exe silent! unmenu '.g:NetrwTopLvlMenu.*')
silent! unlet s:netrw_menu_enabled
endif
endif
" call Dret("NetrwMenu")
endif

endfun

" -----
"
s:NetrwObtain: obtain file under cursor or from markfile list {{{2
" Used by the O maps (as <SID>NetrwObtain())
fun! s:NetrwObtain(islocal)
" call Dfunc("NetrwObtain(islocal=".a:islocal.")")

if exists("s:netrwmarkfilelist_{bufnr('%')}")

```

```

let islocal= s:netrwmarkfilelist_{bufnr('%')}[1] !~ '^a\+://'
call netrw#NetrwObtain(islocal,s:netrwmarkfilelist_{bufnr('%')})
call s:NetrwUnmarkList(bufnr('%'),b:netrw_curdir)
else
call netrw#NetrwObtain(a:islocal,expand("<cWORD>"))
endif

" call Dret("NetrwObtain")
endfun

" -----
" netrw#NetrwObtain: {{{2
" netrw#NetrwObtain(islocal,fname[,tgtdirectory])
" islocal=0 obtain from remote source
" =1 obtain from local source
" fname : a filename or a list of filenames
" tgtdir : optional place where files are to go (not present, uses getcwd())
fun! netrw#NetrwObtain(islocal,fname,...)
"
call Dfunc("netrw#NetrwObtain(islocal=".a:islocal." fname<"((type(a:fname) == 1)? a:fname :
string(a:fname)).">) a:0=".a:0)
" NetrwStatusLine support - for obtaining support

if type(a:fname) == 1
let fnamelist= [ a:fname ]
elseif type(a:fname) == 3
let fnamelist= a:fname
else
call netrw#ErrorMsg(s:ERROR,"attempting to use NetrwObtain on something not a filename or a list",62)
" call Dret("netrw#NetrwObtain")
return
endif
" call Decho("fnamelist<".string(fnamelist).">")
if a:0 > 0
let tgtdir= a:1
else
let tgtdir= getcwd()
endif
" call Decho("tgtdir<".tgtdir.">")

if exists("b:netrw_islocal") && b:netrw_islocal
" obtain a file from local b:netrw_curdir to (local) tgtdir
" call Decho("obtain a file from local ".b:netrw_curdir." to ".tgtdir)
if exists("b:netrw_curdir") && getcwd() != b:netrw_curdir
let topath= s:ComposePath(tgtdir,"")
if (has("win32") || has("win95") || has("win64") || has("win16"))

```



```

" transfer files one at time
" call Decho("transfer files one at a time")
for fname in fnamelist
" call Decho("system(".g:netrw_localcopycmd." ".shellescape(fname)." ".shellescape(topath).)")
call system(g:netrw_localcopycmd." ".shellescape(fname)." ".shellescape(topath))
endfor
else
" transfer files with one command
" call Decho("transfer files with one command")
let filelist= join(map(deepcopy(fnamelist),"shellescape(v:val)"))
" call Decho("system(".g:netrw_localcopycmd." ".filelist." ".shellescape(topath).)")
call system(g:netrw_localcopycmd." ".filelist." ".shellescape(topath))
endif
elseif !exists("b:netrw_curdir")
call netrw#ErrorMsg(s:ERROR,"local browsing directory doesn't exist!",36)
else
call netrw#ErrorMsg(s:WARNING,"local browsing directory and current directory are identical",37)
endif

else
" obtain files from remote b:netrw_curdir to local tgtmdir
" call Decho("obtain
a file from remote ".b:netrw_curdir." to ".tgtmdir)
if type(a:fname) == 1
call s:SetupNetrwStatusLine('%f %h%m%r%=%9*Obtaining 'a:fname)
endif
call s:NetrwMethod(b:netrw_curdir)

if b:netrw_method == 4
" obtain file using scp
" call Decho("obtain via scp (method#4)")
if exists("g:netrw_port") && g:netrw_port != ""
let useport= " ".g:netrw_scpport." ".g:netrw_port
else
let useport= ""
endif
if b:netrw_fname =~ '/'
let path= substitute(b:netrw_fname,'^\(.*/\)\{-}$','\1,')
else
let path= ""
endif
let filelist= join(map(deepcopy(fnamelist),'shellescape(g:netrw_machine." ".path.v:val,1)))
" call Decho("exe ".s:netrw_silentxfer."!".g:netrw_scp_cmd.shellescape(useport,1)." ".filelist."
".shellescape(tgtmdir,1))
exe s:netrw_silentxfer."!".g:netrw_scp_cmd.shellescape(useport,1)." ".filelist." ".shellescape(tgtmdir,1)

elseif b:netrw_method == 2
" obtain file using ftp + .netrc

```

```

" call
Decho("obtain via ftp+.netrc (method #2)")
  call s:SaveBufVars()|silent keepjumps new|call s:RestoreBufVars()
  let tmpbufnr= bufnr("%")
  setlocal ff=unix
  if exists("g:netrw_ftpmode") && g:netrw_ftpmode != ""
    put =g:netrw_ftpmode
"   call Decho("filter input: ".getline('$'))
  endif

  if exists("b:netrw_fname") && b:netrw_fname != ""
    call setline(line("$")+1,'cd "'.b:netrw_fname.'"')
"   call Decho("filter input: ".getline('$'))
  endif

  if exists("g:netrw_ftpextracmd")
    put =g:netrw_ftpextracmd
"   call Decho("filter input: ".getline('$'))
  endif

  for fname in fnamelist
    call setline(line("$")+1,'get "'.fname.'"')
"   call Decho("filter input: ".getline('$'))
  endfor

  if exists("g:netrw_port") && g:netrw_port != ""
"   call Decho("executing: %!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)."
".shellescape(g:netrw_port,1))
    exe s:netrw_silentxfer."%!".g:netrw_ftp_cmd."
-i ".shellescape(g:netrw_machine,1)." ".shellescape(g:netrw_port,1)
    else
"   call Decho("executing: %!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1))
    exe s:netrw_silentxfer."%!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)
  endif

  " If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
  if getline(1) !~ "^$" && !exists("g:netrw_quiet") && getline(1) !~ '^Trying '
    let debugkeep= &debug
    setlocal debug=msg
    call netrw#ErrorMsg(s:ERROR,getline(1),4)
    let &debug= debugkeep
  endif

elseif b:netrw_method == 3
  " obtain with ftp + machine, id, passwd, and fname (ie. no .netrc)
"   call Decho("obtain via ftp+mipf (method #3)")
  call s:SaveBufVars()|silent keepjumps new|call s:RestoreBufVars()
  let tmpbufnr= bufnr("%")
  setlocal ff=unix

  if exists("g:netrw_port") && g:netrw_port != ""

```

```

    put ='open 'g:netrw_machine.' 'g:netrw_port
"   call
Decho("filter input: ".getline('$'))
    else
    put ='open 'g:netrw_machine
"   call Decho("filter input: ".getline('$'))
    endif

if exists("g:netrw_ftp") && g:netrw_ftp == 1
    put =g:netrw_uid
"   call Decho("filter input: ".getline('$'))
    put =\".s:netrw_passwd.\"
"   call Decho("filter input: ".getline('$'))
    else
    put ='user \"g:netrw_uid.\" \"s:netrw_passwd.\"
"   call Decho("filter input: ".getline('$'))
    endif

if exists("g:netrw_ftpmode") && g:netrw_ftpmode != ""
    put =g:netrw_ftpmode
"   call Decho("filter input: ".getline('$'))
    endif

if exists("b:netrw_fname") && b:netrw_fname != ""
    call setline(line("$")+1,'cd "'.b:netrw_fname.'"')
"   call Decho("filter input: ".getline('$'))
    endif

if exists("g:netrw_ftpextracmd")
    put =g:netrw_ftpextracmd
"   call Decho("filter input: ".getline('$'))
    endif

if exists("g:netrw_ftpextracmd")
    put =g:netrw_ftpextracmd
"
    call Decho("filter input: ".getline('$'))
    endif
for fname in fnamelist
    call setline(line("$")+1,'get "'.fname.'"')
endfor
"   call Decho("filter input: ".getline('$'))

" perform ftp:
" -i    : turns off interactive prompting from ftp
" -n unix : DON'T use <.netrc>, even though it exists
" -n win32: quit being obnoxious about password
norm! 1Gdd

```

```

" call Decho("executing: %!" .g:netrw_ftp_cmd." -i -n")
exe s:netrw_silentxfer."%!" .g:netrw_ftp_cmd." -i -n"
" If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
if getline(1) !~ "^$"
" call Decho("error<".getline(1).">")
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,getline(1),5)
endif
endif
elseif !exists("b:netrw_method") || b:netrw_method < 0
" call Dfunc("netrw#NetrwObtain : unsupported method")
return
endif

" restore status line
if type(a:fname) ==
1 && exists("s:netrw_users_stl")
call s:SetupNetrwStatusLine(s:netrw_users_stl)
endif

endif

" cleanup
if exists("tmpbufnr")
if bufnr("%") != tmpbufnr
exe tmpbufnr."bw!"
else
q!
endif
endif

" call Dret("netrw#NetrwObtain")
endfun

" -----
" s:NetrwPrevWinOpen: open file/directory in previous window. {{{2
" If there's only one window, then the window will first be split.
" Returns:
" choice = 0 : didn't have to choose
" choice = 1 : saved modified file in window first
" choice = 2 : didn't save modified file, opened window
" choice = 3 : cancel open
fun! s:NetrwPrevWinOpen(islocal)
" call Dfunc("NetrwPrevWinOpen(islocal=".a:islocal.")")

" grab a copy of the b:netrw_curdir to pass it along to newly split windows
let curdir = b:netrw_curdir

```

```

" get last window number and the word currently under the cursor
let lastwinnr = winnr("$")
let curword = s:NetrwGetWord()
let choice = 0
" call Decho("lastwinnr=".lastwinnr." curword<".curword.">")

let didsplit = 0
if lastwinnr == 1
  " if only one window, open a new one first
  " call Decho("only one window, so open a new one (g:netrw_alto="g:netrw_alto.")")
  if g:netrw_preview
    " call Decho("exe ".(g:netrw_alto? "top " : "bot ")."vert ".g:netrw_winsize."wincmd s")
    exe (g:netrw_alto? "top " : "bot ")."vert ".g:netrw_winsize."wincmd s"
  else
    " call Decho("exe ".(g:netrw_alto? "bel " : "abo ").g:netrw_winsize."wincmd s")
    exe (g:netrw_alto? "bel " : "abo ").g:netrw_winsize."wincmd s"
  endif
  let didsplit = 1

else
  call s:SaveBufVars()
  " call Decho("wincmd p")
  wincmd p
  call s:RestoreBufVars()
  " if the previous window's buffer has been changed (is modified),
  " and it doesn't appear in any other extant window, then ask the
  " user if s/he wants to abandon modifications therein.
  let bnr
  = winbufnr(0)
  let bnrct = 0
  if &mod
    " call Decho("detected: prev window's buffer has been modified: bnr=".bnr." winnr#"winnr())
    let ekeep = &ei
    set ei=all
    windo if winbufnr(0) == bnr | let bnrct=bnrct+1 | endif
    exe bnr."wincmd p"
    let &ei = ekeep
  " call Decho("bnr=".bnr." bnrct=".bnrct." buftype=".&bt." winnr#"winnr())
  if bnrct == 1
    let bufname = bufname(winbufnr(winnr()))
    let choice = confirm("Save modified file<".bufname.">?", "&Yes\n&No\n&Cancel")
  " call Decho("bufname<".bufname."> choice="choice." winnr#"winnr())

  if choice == 1
    " Yes -- write file & then browse
    let v:errmsg = ""
    silent w
    if v:errmsg != ""

```

```

call netrw#ErrorMsg(s:ERROR,"unable to write <".bufname.">!",30)
if didsplit
  q
else
  wincmd p
endif
" call Dret("NetrwPrevWinOpen ".choice." : unable to write <".bufname.">")
return choice
endif

elseif choice == 2
  " No -- don't worry about changed file, just browse anyway
  setlocal nomod
  call netrw#ErrorMsg(s:WARNING,bufname." changes to ".bufname." abandoned",31)
  wincmd p

else
  " Cancel -- don't do this
  if didsplit
    q
  else
    wincmd p
  endif
" call Dret("NetrwPrevWinOpen ".choice." : cancelled")
return choice
endif
endif
endif

" restore b:netrw_curdir (window split/eww may have lost it)
let b:netrw_curdir= curdir
if a:islocal < 2
  if a:islocal
    call netrw#LocalBrowseCheck(s:NetrwBrowseChgDir(a:islocal,curword))
  else
    call s:NetrwBrowse(a:islocal,s:NetrwBrowseChgDir(a:islocal,curword))
  endif
endif
" call Dret("NetrwPrevWinOpen ".choice)
return choice
endfun

" -----
" s:NetrwUpload: load fname to tgt (used by NetrwMarkFileCopy()) {{{2
" Always assumed

```

```

to be local -> remote
"      call s:NetrwUpload(filename, target)
"      call s:NetrwUpload(filename, target, fromdirectory)
fun! s:NetrwUpload(fname,tgt,...)
" call Dfunc("s:NetrwUpload(fname<" .((type(a:fname) == 1)? a:fname : string(a:fname))."> tgt<".a:tgt.">)
a:0=".a:0)

if a:tgt =~ '^a\+://'
  let tgt_dir= substitute(a:tgt,'^a\+://[^/]\+^\(\.\{-}\)\$',\1,")
else
  let tgt_dir= substitute(a:tgt,'^\(\.\{-}\)/[^/]*$',\1,")
endif
" call Decho("tgt_dir<".tgt_dir.">")

if a:0 > 0
  let fromdir= a:1
else
  let fromdir= getcwd()
endif
" call Decho("fromdir<".fromdir.">")

if type(a:fname) == 1
  " handle uploading a single file using NetWrite
  " call Decho("handle uploading a single file via NetWrite")
  lsplit
  " call Decho("exe e ".fnameescape(a:fname))
  exe "e ".fnameescape(a:fname)
  " call Decho("now locally editing<".expand("%").">, has ".line("$")." lines")
  if a:tgt =~ '/'$
    let wfname= substitute(a:fname,'^.*\/',",")
    "
    call Decho("exe w! ".fnameescape(wfname))
    exe "w! ".fnameescape(a:tgt.wfname)
  else
  " call Decho("writing local->remote: exe w ".fnameescape(a:tgt))
  exe "w ".fnameescape(a:tgt)
  " call Decho("done writing local->remote")
  endif
  q!

elseif type(a:fname) == 3
  " handle uploading a list of files via scp
  " call Decho("handle uploading a list of files via scp")
  let curdir= getcwd()
  if a:tgt =~ '^scp:'
    exe "keepjumps silent lcd ".fnameescape(fromdir)
    let filelist= deepcopy(s:netrwmarkfilelist_{bufnr("%)})
    let args = join(map(filelist,"shellescape(v:val, 1)")")

```

```

if exists("g:netrw_port") && g:netrw_port != ""
  let useport= " ".g:netrw_scpport." ".g:netrw_port
else
  let useport= ""
endif
let machine = substitute(a:tgt, '^scp://([^\:]+).*$', '\1,')
let tgt    = substitute(a:tgt, '^scp://([^\:]+/[^.]*)$', '\1,')
"  call Decho("exe ".s:netrw_silentxfer."!".g:netrw_scp_cmd.shellescape(useport,1)."
".args." ".shellescape(machine.":".tgt,1))
exe s:netrw_silentxfer."!".g:netrw_scp_cmd.shellescape(useport,1)." ".args." ".shellescape(machine.":".tgt,1)
exe "keepjumps silent lcd ".fnameescape(curdir)

elseif a:tgt =~ '^ftp:'
  call s:NetrwMethod(a:tgt)

  if b:netrw_method == 2
    " handle uploading a list of files via ftp+.netrc
    let netrw_fname = b:netrw_fname
    silent keepjumps new
    "  call Decho("filter input window#".winnr())

    put =g:netrw_ftpmode
    "  call Decho("filter input: ".getline('$'))

    if exists("g:netrw_ftpextracmd")
      put =g:netrw_ftpextracmd
    "  call Decho("filter input: ".getline('$'))
    endif

    call setline(line("$")+1, 'lcd "'.fromdir.'"')
    "  call Decho("filter input: ".getline('$'))

    call setline(line("$")+1, 'cd "'.tgtdir.'"')
    "  call Decho("filter input: ".getline('$'))

    for fname in a:fname
      call setline(line("$")+1, 'put "'.fname.'"')
    "
      call Decho("filter input: ".getline('$'))
    endfor

    if exists("g:netrw_port") && g:netrw_port != ""
    "  call Decho("executing: ".s:netrw_silentxfer."%!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)."
".shellescape(g:netrw_port,1))
      exe s:netrw_silentxfer."%!".g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)."
".shellescape(g:netrw_port,1)
    else
    "  call Decho("filter input window#".winnr())

```



```

"    call Decho("executing: ".s:netrw_silentxfer."%!" .g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1))
    exe s:netrw_silentxfer."%!" .g:netrw_ftp_cmd." -i ".shellescape(g:netrw_machine,1)
endif
" If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
silent g/Local directory now/d
if getline(1) !~ "^$" && !exists("g:netrw_quiet") && getline(1) !~ '^Trying '
    call netrw#ErrorMsg(s:ERROR,getline(1),14)
else
    bw!|q
endif

elseif b:netrw_method == 3

" upload with ftp + machine, id, passwd, and fname (ie. no .netrc)
let netrw_fname= b:netrw_fname
call s:SaveBufVars()|silent keepjumps new|call s:RestoreBufVars()
let tmpbufnr= bufnr("%")
setlocal ff=unix

if exists("g:netrw_port") && g:netrw_port != ""
    put ='open '.g:netrw_machine.' '.g:netrw_port
"    call Decho("filter input: ".getline('$'))
else
    put ='open '.g:netrw_machine
"    call Decho("filter input: ".getline('$'))
endif

if exists("g:netrw_ftp") && g:netrw_ftp == 1
    put =g:netrw_uid
"    call Decho("filter input: ".getline('$'))
    call setline(line("$")+1,"".s:netrw_passwd."")
"    call Decho("filter input: ".getline('$'))
else
    put ='user \".g:netrw_uid.\" \"\".s:netrw_passwd.\"\"
"    call Decho("filter input: ".getline('$'))
endif

call setline(line("$")+1,'lcd "'.fromdir."")
"    call Decho("filter input: ".getline('$'))

if exists("b:netrw_fname")
&& b:netrw_fname != ""
    call setline(line("$")+1,'cd "'.b:netrw_fname."")
"    call Decho("filter input: ".getline('$'))
endif

if exists("g:netrw_ftpextracmd")
    put =g:netrw_ftpextracmd

```

```

" call Decho("filter input: ".getline('$'))
endif

for fname in a:fname
call setline(line("$")+1,'put "' .fname.'"')
" call Decho("filter input: ".getline('$'))
endifor

" perform ftp:
" -i : turns off interactive prompting from ftp
" -n unix : DON'T use <.netrc>, even though it exists
" -n win32: quit being obnoxious about password
norm! 1Gdd
" call Decho("executing: ".s:netrw_silentxfer."!" .g:netrw_ftp_cmd." -i -n")
exe s:netrw_silentxfer."!" .g:netrw_ftp_cmd." -i -n"
" If the result of the ftp operation isn't blank, show an error message (tnx to Doug Claar)
silent g/Local directory now/d
if getline(1) !~ "^$" && !exists("g:netrw_quiet") && getline(1) !~ '^Trying
,

let debugkeep= &debug
setlocal debug=msg
call netrw#ErrorMsg(s:ERROR,getline(1),15)
let &debug = debugkeep
let mod = 1
else
bw!|q
endif
elseif !exists("b:netrw_method") || b:netrw_method < 0
" call Dfunc("netrw#NetrwUpload : unsupported method")
return
endif
else
call netrw#ErrorMsg(s:ERROR,"can't obtain files with protocol from<".a:tgt.">",63)
endif
endif

" call Dret("s:NetrwUpload")
endfun

" -----
" s:NetrwPreview: {{{2
fun! s:NetrwPreview(path) range
" call Dfunc("NetrwPreview(path<".a:path.">")")
call s:NetrwOptionSave("s:")
call s:NetrwSafeOptions()
if has("quickfix")
if !isdirectory(a:path)
exe (g:netrw_preview? "vert " : "")."pedit ".fnameescape(a:path)

```

```

elseif !exists("g:netrw_quiet")
  call netrw#ErrorMsg(s:WARNING,"sorry, cannot preview a directory such as <".a:path.">",38)
endif
elseif !exists("g:netrw_quiet")
  call netrw#ErrorMsg(s:WARNING,"sorry, to preview your vim needs the quickfix feature compiled in",39)
endif
call s:NetrwOptionRestore("s:")
" call Dret("NetrwPreview")
endfun

" -----
" s:NetrwRefresh: {{{2
fun! s:NetrwRefresh(islocal,dirname)
" call Dfunc("NetrwRefresh(islocal<".a:islocal.">,dirname="a:dirname.") hide="g:netrw_hide."
sortdir="g:netrw_sort_direction)
" at the current time (Mar 19, 2007) all calls to NetrwRefresh() call NetrwBrowseChgDir() first.
" NetrwBrowseChgDir() may clear the display; hence a NetrwSavePosn() may not work if its placed here.
" Also, NetrwBrowseChgDir() now does a NetrwSavePosn() itself.
setlocal ma noro
" call Decho("setlocal ma noro")
" call Decho("clear buffer<".expand("%")."> with :%d")
%d
if a:islocal
  call netrw#LocalBrowseCheck(a:dirname)
else
  call s:NetrwBrowse(a:islocal,a:dirname)
endif
call netrw#NetrwRestorePosn()

" restore file marks
if exists("s:netrwmarkfilemtch_{bufnr("%)}") && s:netrwmarkfilemtch_{bufnr("%)} != ""
" call Decho("exe 2match netrwMarkFile /".s:netrwmarkfilemtch_{bufnr("%)}."/")
exe "2match netrwMarkFile /".s:netrwmarkfilemtch_{bufnr("%)}."/")
else
" call Decho("2match none")
2match none
endif

" redraw!
" call Dret("NetrwRefresh")
endfun

" -----
" s:NetrwRefreshDir: refreshes a directory by name {{{2
"           Called by NetrwMarkFileCopy()
"           Interfaces to s:NetrwRefresh() and s:LocalBrowseShellCmdRefresh()
fun! s:NetrwRefreshDir(islocal,dirname)
" call Dfunc("s:NetrwRefreshDir(islocal="a:islocal." dirname="a:dirname.">) fastbrowse="g:netrw_fastbrowse)

```

```

if g:netrw_fastbrowse == 0
" slowest mode (keep buffers refreshed, local or remote)
" call Decho("slowest mode: keep buffers refreshed, local or
remote")
let tgtwin= bufwinnr(a:dirname)
" call Decho("tgtwin= bufwinnr(".a:dirname.")=".tgtwin)

if tgtwin > 0
" tgtwin is being displayed, so refresh it
let curwin= winnr()
" call Decho("refresh tgtwin#" .tgtwin." (curwin#" .curwin.")")
exe tgtwin."wincmd w"
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,'./'))
exe curwin."wincmd w"

elseif bufnr(a:dirname) > 0
let bn= bufnr(a:dirname)
" call Decho("bd bufnr(".a:dirname.")=".bn)
exe "silent bd ".bn
endif

elseif g:netrw_fastbrowse <= 1
" call Decho("medium-speed mode: refresh local buffers only")
call s:LocalBrowseShellCmdRefresh()
endif
" call Dret("s:NetrwRefreshDir")
endfun

" -----
" s:NetrwSetSort: sets up the sort based on the g:netrw_sort_sequence {{{2
" What this function does is to compute a priority for the patterns
" in the g:netrw_sort_sequence.
" It applies a substitute to any
" "files" that satisfy each pattern, putting the priority / in
" front. An "*" pattern handles the default priority.
fun! s:NetrwSetSort()
" call Dfunc("SetSort() bannercnt=".w:netrw_bannercnt)
if w:netrw_liststyle == s:LONGLIST
let seqlist = substitute(g:netrw_sort_sequence,'$','\|%\(\t\|\\$\|\\)','ge')
else
let seqlist = g:netrw_sort_sequence
endif
" sanity check -- insure that * appears somewhere
if seqlist == ""
let seqlist= '*'
elseif seqlist !~ '*'
let seqlist= seqlist.*'
endif

```

```

let priority = 1
while seqlist != ""
if seqlist =~ ','
let seq = substitute(seqlist,','*$',','e)
let seqlist = substitute(seqlist,^\{-},\{.*\}$,'1',e)
else
let seq = seqlist
let seqlist = ""
endif
let sepchr= "\<Char-0xff>"
if priority < 10
let spriority= "00".priority.sepchr
elseif priority < 100
let spriority= "0".priority.sepchr
else
let spriority= priority.sepchr
endif
" call Decho("priority=".priority." spriority<".spriority."> seq<".seq."> seqlist<".seqlist.">")

" sanity check
if w:netrw_bannercnt > line("$")
" apparently no files were left after a Hiding pattern was used
" call Dret("SetSort : no files left after hiding")
return
endif
if seq == '*'
let starpriority= priority
else
exe 'silent keepjumps '.w:netrw_bannercnt.',$g/'.seq.'/s/^/'.spriority.'/'
" sometimes multiple sorting patterns will match the same file or directory.
" The following substitute is intended to remove the excess matches.
exe 'silent keepjumps '.w:netrw_bannercnt.',$g/^\d\{3\}'.sepchr.'\d\{3\}/s/^\d\{3\}'.sepchr.'\(\d\{3\}\|\^)\.@=/1/e'
endif
let priority = priority + 1
endwhile
if exists("starpriority")
exe 'silent keepjumps '.w:netrw_bannercnt.',$v/^\d\{3\}'.sepchr.'/s/^/'.starpriority.'/'
endif

" Following line associated with priority
-- items that satisfy a priority
" pattern get prefixed by ###/ which permits easy sorting by priority.
" Sometimes files can satisfy multiple priority patterns -- only the latest
" priority pattern needs to be retained. So, at this point, these excess
" priority prefixes need to be removed, but not directories that happen to
" be just digits themselves.
exe 'silent keepjumps '.w:netrw_bannercnt.',$s/^\(\d\{3\}'.sepchr.'\)\%(\d\{3\}'.sepchr.'\)|+ze./1/e'

```

```

" call Dret("SetSort")
endfun

" =====
" s:NetrwSortStyle: change sorting style (name - time - size) and refresh display {{{2
fun! s:NetrwSortStyle(islocal)
" call Dfunc("s:NetrwSortStyle(islocal=".a:islocal.") netrw_sort_by<".g:netrw_sort_by.">")
call s:NetrwSaveWordPosn()
let svpos= netrw#NetrwSavePosn()

let g:netrw_sort_by= (g:netrw_sort_by =~ 'n')? 'time' : (g:netrw_sort_by =~ 't')? 'size' : 'name'
norm! 0
call s:NetrwRefresh(a:islocal,s:NetrwBrowseChgDir(a:islocal,./))
call netrw#NetrwRestorePosn(svpos)

" call Dret("s:NetrwSortStyle : netrw_sort_by<".g:netrw_sort_by.">")
endfun

" -----
" s:NetrwSplit: mode {{{2
"   =0 : net  and o
"   =1 : net  and t
"   =2 : net  and v
"   =3 : local and o
"   =4 : local and t
"   =5 : local and v
fun! s:NetrwSplit(mode)
" call Dfunc("s:NetrwSplit(mode=".a:mode.") alto="g:netrw_alto." altv="g:netrw_altv)

call s:SaveWinVars()

if a:mode == 0
" remote and o
" call Decho("exe ".(g:netrw_alto? "bel " : "abo ").g:netrw_winsize."wincmd s")
exe (g:netrw_alto? "bel " : "abo ").g:netrw_winsize."wincmd s"
let s:didsplit= 1
call s:RestoreWinVars()
call s:NetrwBrowse(0,s:NetrwBrowseChgDir(0,s:NetrwGetWord()))
unlet s:didsplit

elseif a:mode == 1
" remote and t
let newdir = s:NetrwBrowseChgDir(0,s:NetrwGetWord())
"
" call Decho("tabnew")
tabnew
let s:didsplit= 1
call s:RestoreWinVars()

```

```

call s:NetrwBrowse(0,newdir)
unlet s:didsplit

elseif a:mode == 2
" remote and v
" call Decho("exe ".(g:netrw_altv? "rightb " : "lefta ").g:netrw_winsize."wincmd v")
exe (g:netrw_altv? "rightb " : "lefta ").g:netrw_winsize."wincmd v"
let s:didsplit= 1
call s:RestoreWinVars()
call s:NetrwBrowse(0,s:NetrwBrowseChgDir(0,s:NetrwGetWord()))
unlet s:didsplit

elseif a:mode == 3
" local and o
" call Decho("exe ".(g:netrw_alto? "bel " : "abo ").g:netrw_winsize."wincmd s")
exe (g:netrw_alto? "bel " : "abo ").g:netrw_winsize."wincmd s"
let s:didsplit= 1
call s:RestoreWinVars()
call netrw#LocalBrowseCheck(s:NetrwBrowseChgDir(1,s:NetrwGetWord()))
unlet s:didsplit

elseif a:mode == 4
" local and t
let netrw_curdir= b:netrw_curdir
let cursorword = s:NetrwGetWord()
" call Decho("tabnew")
tabnew

let b:netrw_curdir= netrw_curdir
let s:didsplit= 1
call s:RestoreWinVars()
call netrw#LocalBrowseCheck(s:NetrwBrowseChgDir(1,cursorword))
unlet s:didsplit

elseif a:mode == 5
" local and v
" call Decho("exe ".(g:netrw_altv? "rightb " : "lefta ").g:netrw_winsize."wincmd v")
exe (g:netrw_altv? "rightb " : "lefta ").g:netrw_winsize."wincmd v"
let s:didsplit= 1
call s:RestoreWinVars()
call netrw#LocalBrowseCheck(s:NetrwBrowseChgDir(1,s:NetrwGetWord()))
unlet s:didsplit

else
call netrw#ErrorMsg(s:ERROR, "(NetrwSplit) unsupported mode=" .a:mode,45)
endif

" call Dret("s:NetrwSplit")

```

```

endfun

" -----
" NetrwStatusLine: {{{2
fun! NetrwStatusLine()

" vvv NetrwStatusLine() debugging vvv
" let g:stlmsg=""
" if !exists("w:netrw_explore_bufnr")
" let g:stlmsg="!X<explore_bufnr>"
" elseif w:netrw_explore_bufnr != bufnr("%")
" let g:stlmsg="explore_bufnr!=".bufnr("%")
"
endif
" if !exists("w:netrw_explore_line")
" let g:stlmsg=" !X<explore_line>"
" elseif w:netrw_explore_line != line(".")
" let g:stlmsg=" explore_line!={line(.)<".line(".).">"
" endif
" if !exists("w:netrw_explore_list")
" let g:stlmsg=" !X<explore_list>"
" endif
" ^^^ NetrwStatusLine() debugging ^^^

if !exists("w:netrw_explore_bufnr") || w:netrw_explore_bufnr != bufnr("%") || !exists("w:netrw_explore_line") ||
w:netrw_explore_line != line(".") || !exists("w:netrw_explore_list")
" restore user's status line
let &stl = s:netrw_users_stl
let &laststatus = s:netrw_users_ls
if exists("w:netrw_explore_bufnr")|unlet w:netrw_explore_bufnr|endif
if exists("w:netrw_explore_line")|unlet w:netrw_explore_line|endif
return ""
else
return "Match ".w:netrw_explore_mtchcnt." of ".w:netrw_explore_listlen
endif
endfun

" -----
" s:NetrwTreeDir: determine tree
directory given current cursor position {{{2
" (full path directory with trailing slash returned)
fun! s:NetrwTreeDir()
" call Dfunc("NetrwTreeDir() curline#.line(".)."<".getline('.')."> b:netrw_curdir<".b:netrw_curdir.">
tab#.tabpagenr()." win#.winnr()." buf#.bufnr("%")."<".bufname("%").">")

let treedir= b:netrw_curdir
" call Decho("set initial treedir<".treedir.">")
let s:treecurpos= netrw#NetrwSavePosn()

```



```

if w:netrw_liststyle == s:TREELIST
" call Decho("w:netrw_liststyle is TREELIST:")
" call Decho("line#.line(".").- getline(.)<"getline('.')> treecurpos<".string(s:treecurpos).">")
if getline('.') =~ '/'$'
let treedir= substitute(getline('.'),'^\%(| \)*\([^\].\{-}\)$',\1,'e')
else
let treedir= ""
endif

" call Decho("treedir<".treedir.">")

" detect user attempting to close treeroot
if getline('.') !~ '|' && getline('.') != '..'
" call Decho("user attempted to close treeroot")
" now force a refresh
"
call Decho("clear buffer<".expand("%")."> with :%d")
keepjumps %d
" call Dret("NetrwTreeDir <".treedir."> : (side effect) s:treecurpos<".string(s:treecurpos).">")
return b:netrw_curdir
endif

" elide all non-depth information
let depth = substitute(getline('.'),'^\%(| \)*\([^\].\{-}\)$',\1,'e')
" call Decho("depth<".depth."> 1st subst")

" elide first depth
let depth = substitute(depth,'^| ','')
" call Decho("depth<".depth."> 2nd subst")

" construct treedir by searching backwards at correct depth
" call Decho("constructing treedir<".treedir."> depth<".depth.">")
while depth != "" && search('^'.depth.'[^\].\{-}$',bW)
let dirname= substitute(getline('.'),'^\%(| \)*','','e')
let treedir= dirname.treedir
let depth = substitute(depth,'^| ','')
" call Decho("constructing treedir<".treedir.">: dirname<".dirname."> while depth<".depth.">")
endwhile
if w:netrw_treetop =~ '/'$'
let treedir= w:netrw_treetop.treedir
else
let treedir= w:netrw_treetop.'/'.treedir
endif
" call Decho("bufnr(.)=".bufnr("%")." line($)=.line("$")." line(.)=.line(".")")
endif
let treedir= substitute(treedir,'/$','/',")

```

```

" " now force a refresh
"" call DECHO("clear buffer<".expand("%")."> with :%d")
" setlocal ma noro
" keepjumps %d

" call Dret("NetrwTreeDir <".treedir."> : (side effect) s:treecurpos<".string(s:treecurpos).">")
return treedir
endfun

" -----
" s:NetrwTreeDisplay: recursive tree display {{{2
fun! s:NetrwTreeDisplay(dir,depth)
" call Dfunc("NetrwTreeDisplay(dir<".a:dir."> depth<".a:depth.">")

" insure that there are no folds
setlocal nofen

" install ../ and shortdir
if a:depth == ""
call setline(line("$")+1,'../')
" call Decho("setline#".line("$")." ../ (depth is zero)")
endif
if a:dir =~ '^a\+://'
if a:dir == w:netrw_treetop
let shortdir= a:dir
else
let shortdir= substitute(a:dir,'^.*\([^\|]+\)/$','\1','e')
endif
call setline(line("$")+1,a:depth.shortdir)
else
let shortdir= substitute(a:dir,'^.*/',','e')
call setline(line("$")+1,a:depth.shortdir.'/')
endif
" call Decho("setline#".line("$")." shortdir<".a:depth.shortdir.">")

" append a / to dir if its missing one
let dir= a:dir
if dir !~ '/'$'
let dir= dir.'/'
endif

" display subtrees (if any)
let depth= "| ".a:depth

" call Decho("display subtrees with depth<".depth."> and current leaves")
for entry in w:netrw_treedict[a:dir]
let direntry= substitute(dir.entry,'/$','e')
" call Decho("dir<".dir."> entry<".entry."> direntry<".direntry.">")

```

```

if entry =~ '/' && has_key(w:netrw_treedict,direntry)
" call Decho("<.direntry.> is a key in treedict - display subtree for it")
call s:NetrwTreeDisplay(direntry,depth)
elseif entry =~ '/' && has_key(w:netrw_treedict,direntry.'/')
" call
Decho("<.direntry.> is a key in treedict - display subtree for it")
call s:NetrwTreeDisplay(direntry.'/',depth)
else
" call Decho("<.entry.> is not a key in treedict (no subtree)")
call setline(line("$")+1,depth.entry)
endif
endfor
" call Dret("NetrwTreeDisplay")
endfun

" -----
" s:NetrwTreeListing: displays tree listing from treetop on down, using NetrwTreeDisplay() {{{2
fun! s:NetrwTreeListing(dirname)
if w:netrw_liststyle == s:TREELIST
" call Dfunc("NetrwTreeListing() bufname<".expand("%").">")
" call Decho("curdir<.a:dirname.>")
" call Decho("win#.winnr().": w:netrw_treetop ".(exists("w:netrw_treetop")? "exists" : "doesn't exit")."
w:netrw_treedict ".(exists("w:netrw_treedict")? "exists" : "doesn't exit"))

" update the treetop
" call Decho("update the treetop")
if !exists("w:netrw_treetop")
let w:netrw_treetop= a:dirname
" call Decho("w:netrw_treetop<.w:netrw_treetop.>
(reusing)")
elseif (w:netrw_treetop =~ ('^'.a:dirname) && s:Strlen(a:dirname) < s:Strlen(w:netrw_treetop)) || a:dirname !~
('^'.w:netrw_treetop)
let w:netrw_treetop= a:dirname
" call Decho("w:netrw_treetop<.w:netrw_treetop.> (went up)")
endif

" insure that we have at least an empty treedict
if !exists("w:netrw_treedict")
let w:netrw_treedict= {}
endif

" update the directory listing for the current directory
" call Decho("updating dictionary with ".a:dirname.":[.directory listing..]")
" call Decho("bannercnt=".w:netrw_bannercnt." line($)=.line("$"))
exe "silent! keepjumps ".w:netrw_bannercnt.',$g@^\.\.|=/@$@d'
let w:netrw_treedict[a:dirname]= getline(w:netrw_bannercnt,line("$"))
" call Decho("w:treedict[".a:dirname."]= ".w:netrw_treedict[a:dirname])
exe "silent! keepjumps ".w:netrw_bannercnt.',$d"

```

```

" if past banner, record word
if exists("w:netrw_bannercnt") && line(".") > w:netrw_bannercnt
    let fname= expand("<cword>")
else
    let fname= ""
endif
" call Decho("fname<".fname.">")

" display from treetop on down
call s:NetrwTreeDisplay(w:netrw_treetop,"")

" call Dret("NetrwTreeListing : bufname<".expand("%").">")
endif
endfun

" -----
" s:NetrwWideListing: {{{2
fun! s:NetrwWideListing()

if w:netrw_liststyle == s:WIDELIST
" call Dfunc("NetrwWideListing() w:netrw_liststyle="w:netrw_liststyle.' fo='.&fo.' l:fo='.&l:fo)
" look for longest filename (cpf=characters per filename)
" cpf: characters per file
" fpl: files per line
" fpc: files per column
setlocal ma noro
" call Decho("setlocal ma noro")
let b:netrw_cpf= 0
if line("$") >= w:netrw_bannercnt
    exe 'silent keepjumps '.w:netrw_bannercnt.',$g/^./if virtcol("$") > b:netrw_cpf|let b:netrw_cpf= virtcol("$)|endif'
else
" call Dret("NetrwWideListing")
return
endif
"
    call Decho("max file strlen+1="b:netrw_cpf)
let b:netrw_cpf= b:netrw_cpf + 1

" determine qty files per line (fpl)
let w:netrw_fpl= winwidth(0)/b:netrw_cpf
if w:netrw_fpl <= 0
    let w:netrw_fpl= 1
endif
" call Decho("fpl= ".winwidth(0)."/[b:netrw_cpf="b:netrw_cpf.']=w:netrw_fpl)

" make wide display
exe 'silent keepjumps '.w:netrw_bannercnt.',$s/^.*$/^=escape(sprintf("%-'.b:netrw_cpf.'s",submatch(0)),"\\")/'

```

```

let fpc      = (line("$") - w:netrw_bannercnt + w:netrw_fpl)/w:netrw_fpl
let newcolstart = w:netrw_bannercnt + fpc
let newcolend  = newcolstart + fpc - 1
" call Decho("bannercnt=".w:netrw_bannercnt." fpl=".w:netrw_fpl." fpc=".fpc."
newcol["newcolstart.", ".newcolend."])
silent! let keepregstar = @*
while line("$") >= newcolstart
  if newcolend > line("$") | let newcolend= line("$") | endif
  let newcolqty= newcolend - newcolstart
  exe newcolstart
  if newcolqty == 0
    exe "silent keepjumps
norm! 0<c-v>$hx".w:netrw_bannercnt."G$p"
  else
    exe "silent keepjumps norm! 0<c-v>".newcolqty.'j$hx'.w:netrw_bannercnt.'G$p'
  endif
  exe "silent keepjumps ".newcolstart.''.newcolend.'d'
  exe 'silent keepjumps '.w:netrw_bannercnt
endwhile
silent! let @*= keepregstar
exe "silent keepjumps ".w:netrw_bannercnt.',$s\s\+$/e'
setlocal noma nomod ro
" call Dret("NetrwWideListing")
endif

endfun

" -----
" s:PerformListing: {{{2
fun! s:PerformListing(islocal)
" call Dfunc("s:PerformListing(islocal=".a:islocal.") buf(%)=".bufnr("%")."<".bufname("%").">")

call s:NetrwSafeOptions()
setlocal noro ma
" call Decho("setlocal noro ma")

" if exists("g:netrw_silent") && g:netrw_silent == 0 && &ch >= 1 " Decho
" call Decho("(netrw) Processing your browsing request...")
" endif      " Decho

" call Decho('w:netrw_liststyle='.(exists("w:netrw_liststyle")? w:netrw_liststyle
: 'n/a'))
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST && exists("w:netrw_treedict")
" force a refresh for tree listings
" call Decho("force refresh for treelisting: clear buffer<".expand("%")."> with :%d")
keepjumps %d
endif

```

```

" save current directory on directory history list
call s:NetrwBookHistHandler(3,b:netrw_curdir)

" Set up the banner {{{3
" call Decho("set up banner")
keepjumps put =\
=====
keepjumps put =\ Netrw Directory Listing (netrw 'g:loaded_netrw.')
```

```

keepjumps put =\ 'b:netrw_curdir
keepjumps 1d
let w:netrw_bannercnt= 3
exe "keepjumps ".w:netrw_bannercnt

let sortby= g:netrw_sort_by
if g:netrw_sort_direction =~ "^r"
  let sortby= sortby." reversed"
endif

" Sorted by... {{{3
" call Decho("handle specified sorting: g:netrw_sort_by<".g:netrw_sort_by.">")
if
  g:netrw_sort_by =~ "^n"
  " call Decho("directories will be sorted by name")
  " sorted by name
  keepjumps put =\ Sorted by '.sortby'
  keepjumps put =\ Sort sequence: 'g:netrw_sort_sequence'
  let w:netrw_bannercnt= w:netrw_bannercnt + 2
else
  " call Decho("directories will be sorted by size or time")
  " sorted by size or date
  keepjumps put =\ Sorted by '.sortby'
  let w:netrw_bannercnt= w:netrw_bannercnt + 1
endif
exe "keepjumps ".w:netrw_bannercnt

" show copy/move target, if any
if exists("s:netrw_mftgt") && exists("s:netrw_mftgt_islocal")
" call Decho("show copy/move target<".s:netrw_mftgt.">")
keepjumps put =
if s:netrw_mftgt_islocal
  call setline(line("."), " Copy/Move Tgt: 's:netrw_mftgt.' (local)")
else
  call setline(line("."), " Copy/Move Tgt: 's:netrw_mftgt.' (remote)")
endif
let w:netrw_bannercnt= w:netrw_bannercnt + 1
else
" call Decho("s:netrw_mftgt does not exist, don't make Copy/Move
```

```

Tgt")
endif
exe "keepjumps ".w:netrw_bannercnt

" Hiding... -or- Showing... {{{3
" call Decho("handle hiding/showing (g:netrw_hide=".g:netrw_list_hide."
g:netrw_list_hide<".g:netrw_list_hide.">")")
if g:netrw_list_hide != "" && g:netrw_hide
if g:netrw_hide == 1
keepjumps put =\" Hiding:    '.g:netrw_list_hide
else
keepjumps put =\" Showing:    '.g:netrw_list_hide
endif
let w:netrw_bannercnt= w:netrw_bannercnt + 1
endif
exe "keepjumps ".w:netrw_bannercnt
keepjumps put =\" Quick Help: <F1>:help -:go up dir D:delete R:rename s:sort-by x:exec'
keepjumps put =\"
=====
let w:netrw_bannercnt= w:netrw_bannercnt + 2

" bannercnt should index the line just after the banner
let w:netrw_bannercnt= w:netrw_bannercnt + 1
exe "keepjumps ".w:netrw_bannercnt
" call Decho("bannercnt=".w:netrw_bannercnt." (should index line just after banner)
line($)=.line("$)")

" set up syntax highlighting {{{3
" call Decho("set up syntax highlighting")
if has("syntax")
setlocal ft=netrw
if !exists("g:syntax_on") || !g:syntax_on
setlocal ft=
endif
endif

" get list of files
" call Decho("Get list of files - islocal=".a:islocal)
if a:islocal
call s:LocalListing()
else " remote
call s:NetrwRemoteListing()
endif
" call Decho("w:netrw_bannercnt=".w:netrw_bannercnt." (banner complete)")

" manipulate the directory listing (hide, sort) {{{3
if line("$") >= w:netrw_bannercnt
" call Decho("manipulate directory listing (hide)")

```

```

" call Decho("g:netrw_hide="g:netrw_hide." g:netrw_list_hide<"g:netrw_list_hide.">")
if g:netrw_hide && g:netrw_list_hide != ""
    call s:NetrwListHide()
endif
if line("$") >= w:netrw_bannercnt
" call Decho("manipulate directory listing (sort) : g:netrw_sort_by<"g:netrw_sort_by.">")

if g:netrw_sort_by =~ "^n"
" sort by name
    call s:NetrwSetSort()

if w:netrw_bannercnt < line("$")
" call Decho("g:netrw_sort_direction="g:netrw_sort_direction." (bannercnt="w:netrw_bannercnt."))
if g:netrw_sort_direction =~ 'n'
" normal direction sorting
    exe 'silent keepjumps '.w:netrw_bannercnt.',$sort!.'.g:netrw_sort_options
else
" reverse direction sorting
    exe 'silent keepjumps '.w:netrw_bannercnt.',$sort!.'.g:netrw_sort_options
endif
endif
" remove priority pattern prefix
" call Decho("remove priority pattern prefix")
let sepchr= "\<Char-0xff>"
exe 'silent keepjumps '.w:netrw_bannercnt.',$s/^\d\{3\}.sepchr.//'

elseif a:islocal
if w:netrw_bannercnt < line("$")
" call Decho("g:netrw_sort_direction="g:netrw_sort_direction)
if g:netrw_sort_direction =~ 'n'
" call Decho('exe silent keepjumps '.w:netrw_bannercnt.',$sort')
    exe 'silent keepjumps '.w:netrw_bannercnt.',$sort!.'.g:netrw_sort_options
else
" call Decho('exe silent keepjumps '.w:netrw_bannercnt.',$sort!')
    exe 'silent keepjumps '.w:netrw_bannercnt.',$sort!.'.g:netrw_sort_options
endif
endif
exe 'silent keepjumps '.w:netrw_bannercnt.',$s/^\d\{-\}///e'
endif

elseif g:netrw_sort_direction =~ 'r'
" call Decho('reverse the sorted listing')
    exe 'silent keepjumps '.w:netrw_bannercnt.'g/^m '.w:netrw_bannercnt
endif
endif

" convert to wide/tree listing {{{3
" call Decho("modify display if wide/tree listing style")

```



```

call s:NetrwWideListing()
call s:NetrwTreeListing(b:netrw_curdir)

if exists("w:netrw_bannercnt") && line("$") > w:netrw_bannercnt
" place cursor on the top-left corner of the file listing
" call Decho("place cursor on top-left corner of file listing")
exe 'silent keepjumps '.w:netrw_bannercnt
norm! 0
endif

" record previous current directory
let w:netrw_prvdir= b:netrw_curdir
" call
Decho("record netrw_prvdir<".w:netrw_prvdir.">")

" save certain window-oriented variables into buffer-oriented variables {{{3
call s:SetBufWinVars()
call s:NetrwOptionRestore("w:")

" set display to netrw display settings
" call Decho("set display to netrw display settings (noma nomod etc)")
setlocal noma nomod nonu nobl nowrap ro
if exists("s:treecurpos")

call netrw#NetrwRestorePosn(s:treecurpos)
unlet s:treecurpos
endif

" call Dret("s:PerformListing : curpos<".string(getpos(".")).">")
endfun

" -----
" s:SetupNetrwStatusLine: {{{2
fun! s:SetupNetrwStatusLine(statline)
" call Dfunc("SetupNetrwStatusLine(statline<".a:statline.">")

if !exists("s:netrw_setup_statline")
let s:netrw_setup_statline= 1
" call Decho("do first-time status line setup")

if !exists("s:netrw_users_stl")
let s:netrw_users_stl= &stl
endif
if !exists("s:netrw_users_ls")
let s:netrw_users_ls= &laststatus
endif

" set up User9 highlighting as needed

```

```

let keepa= @a
redir @a
try
  hi User9
catch /^Vim\%((\a+)\)\=:E411/
  if &bg == "dark"
    hi User9 ctermfg=yellow ctermbg=blue guifg=yellow guibg=blue
  else
    hi User9 ctermfg=yellow ctermfg=blue guifg=yellow guibg=blue
  endif
endtry
redir END
let @a= keepa
endif

" set up status line (may use User9 highlighting)
" insure that windows have a statusline
" make sure statusline is displayed
let &stl=a:statline
setlocal laststatus=2
" call Decho("stl=".&stl)
redraw

" call Dret("SetupNetrwStatusLine : stl=".&stl)
endfun

" -----
" Remote Directory Browsing Support:  {{{1
" =====

" -----
" s:NetrwRemoteListing:  {{{2
fun! s:NetrwRemoteListing()
" call
Dfunc("s:NetrwRemoteListing() b:netrw_curdir<" .b:netrw_curdir.">")

call s:RemotePathAnalysis(b:netrw_curdir)

" sanity check:
if exists("b:netrw_method") && b:netrw_method =~ '[235]'
" call Decho("b:netrw_method=" .b:netrw_method)
if !executable("ftp")
if !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,"this system doesn't support remote directory listing via ftp",18)
endif
call s:NetrwOptionRestore("w:")
" call Dret("s:NetrwRemoteListing")
return

```

```

endif

elseif !exists("g:netrw_list_cmd") || g:netrw_list_cmd == "
if !exists("g:netrw_quiet")
if g:netrw_list_cmd == ""
call netrw#ErrorMsg(s:ERROR,g:netrw_ssh_cmd." is not executable on your system",47)
else
call netrw#ErrorMsg(s:ERROR,"this system doesn't support remote directory listing via ".g:netrw_list_cmd,19)
endif
endif

call s:NetrwOptionRestore("w:")
" call Dret("s:NetrwRemoteListing")
return
endif " (remote handling
sanity check)

if exists("b:netrw_method")
" call Decho("setting w:netrw_method<".b:netrw_method.">")
let w:netrw_method= b:netrw_method
endif

if s:method == "ftp"
" use ftp to get remote file listing
" call Decho("use ftp to get remote file listing")
let s:method = "ftp"
let listcmd = g:netrw_ftp_list_cmd
if g:netrw_sort_by =~ '^t'
let listcmd= g:netrw_ftp_timelist_cmd
elseif g:netrw_sort_by =~ '^s'
let listcmd= g:netrw_ftp_sizelist_cmd
endif
" call Decho("listcmd<".listcmd."> (using g:netrw_ftp_list_cmd)")
call s:NetrwRemoteFtpCmd(s:path,listcmd)
" exe "keepjumps ".w:netrw_bannercnt.',$g/^./call Decho("raw listing: ".getline("."))'

if w:netrw_liststyle == s:THINLIST || w:netrw_liststyle == s:WIDELIST || w:netrw_liststyle == s:TREELIST
" shorten the listing
" call Decho("generate short listing")
exe "keepjumps ".w:netrw_bannercnt

" cleanup
if g:netrw_ftp_browse_reject != ""
exe "silent!"
g/"g:netrw_ftp_browse_reject."/keepjumps d"
endif
silent! keepjumps %s\r$/e

```

```

" if there's no ../ listed, then put ./ and ../ in
let line1= line(".")
exe "keepjumps ".w:netrw_bannercnt
let line2= search('^\.\.\\%(\s|$)','cnW')
if line2 == 0
" call Decho("netrw is putting ./ and ../ into listing")
keepjumps put='./'
keepjumps put='../'
endif
exe "keepjumps ".line1
keepjumps norm! 0

" call Decho("line1=".line1." line2=".line2." line(.)=".line("."))
if search('^d\{2}-d\{2}-d\{2}\s',n) " M$ ftp site cleanup
" call Decho("M$ ftp cleanup")
exe 'silent! keepjumps '.w:netrw_bannercnt.',s/^d\{2}-d\{2}-
\d\{2}\s+\d\+:\d\+[AaPp][Mm]\s+\%(<DIR>\\d\+)\s+/'
else " normal ftp cleanup
" call Decho("normal ftp cleanup")
exe 'silent! keepjumps '.w:netrw_bannercnt.',s/^(\%(\S\+|\s\+)\{7}\S\+)\s+(\%(\S.*))\$/2/e'
exe "silent! keepjumps ".w:netrw_bannercnt.',$g/ -> /s#
-> .*/$##/e'
exe "silent! keepjumps ".w:netrw_bannercnt.',$g/ -> /s# -> .*/$##/e'
endif
endif

else
" use ssh to get remote file listing {{{3
" call Decho("use ssh to get remote file listing: s:path<".s:path.">")
let listcmd= s:MakeSshCmd(g:netrw_list_cmd)
" call Decho("listcmd<".listcmd."> (using g:netrw_list_cmd)")
if g:netrw_scp_cmd =~ '^pscp'
" call Decho("1: exe silent r! ".shellescape(listcmd.s:path, 1))
exe "silent r! ".listcmd.shellescape(s:path, 1)
" remove rubbish and adjust listing format of 'pscp' to 'ssh ls -FLa' like
g/^Listing directory/d
g/^d[-rwx][-rwx][-rwx]/s+$/+e
silent g/^l[-rwx][-rwx][-rwx]/s+$/+@+e
if g:netrw_liststyle != s:LONGLIST
g/^[\d\sp-][-rwx][-rwx][-rwx]/s/^\.*\s(\S\+)\$/1/e
endif
endif
else
if s:path == ""
" call Decho("2: exe silent r! ".listcmd)
exe "silent r! ".listcmd
else
" call Decho("3: exe silent r! ".listcmd.' '.shellescape(s:path,1))
exe

```

```

"silent r! ".listcmd.'!shellescape(s:path,1)
" call Decho("listcmd<".listcmd."> path<".s:path.">")
endif
endif

" cleanup
if g:netrw_ftp_browse_reject != ""
" call Decho("(cleanup) exe silent! g/".g:netrw_ssh_browse_reject."/keepjumps d")
exe "silent! g/".g:netrw_ssh_browse_reject."/keepjumps d"
endif
endif

if w:netrw_liststyle == s:LONGLIST
" do a long listing; these substitutions need to be done prior to sorting {{{3
" call Decho("fix long listing:")

if s:method == "ftp"
" cleanup
exe "keepjumps ".w:netrw_bannercnt
while getline('.') =~ g:netrw_ftp_browse_reject
keepjumps d
endwhile
" if there's no ./ listed, then put ./ and ./ in
let line1= line(".")
keepjumps 1
silent keepjumps call search('^\.\.\\%(\\s\\$)\','W')
let line2= line(".")
if line2 == 0
exe 'keepjumps '.w:netrw_bannercnt."put='./'"
if b:netrw_curdir != '/'
exe 'keepjumps '.w:netrw_bannercnt."put='./'"
endif
endif
exe "keepjumps ".line1
keepjumps norm! 0
endif

if search('^\\d\\{2}-\\d\\{2}-\\d\\{2}\\s','n') " M$ ftp site cleanup
" call Decho("M$ ftp site listing cleanup")
exe 'silent! keepjumps '.w:netrw_bannercnt.',$s/^(\\d\\{2}-\\d\\{2}-
\\d\\{2}\\s+\\d+:\\d+[AaPp][Mm]\\s+\\%(<DIR>\\|\\d+\\)|\\s+\\)(\\w.*\\)$\\2\\t1/'
elseif exists("w:netrw_bannercnt") && w:netrw_bannercnt <= line("$")
" call Decho("normal ftp site listing cleanup: bannercnt=".w:netrw_bannercnt." line($)=.line("$")")
exe 'silent keepjumps '.w:netrw_bannercnt.',$s/ -> .*$/e'
exe 'silent keepjumps '.w:netrw_bannercnt.',$s/^(\\%(\\S\\|\\s+\\)\\{7}\\S\\|\\)\\s+\\(\\S.*\\)$\\2\\t1/e'
exe 'silent keepjumps '.w:netrw_bannercnt
endif
endif

```

```

" if exists("w:netrw_bannercnt") && w:netrw_bannercnt <= line("$") " Decho
" exe "keepjumps ".w:netrw_bannercnt.',$g/^./call Decho("listing: ".getline("."))'
" endif " Decho
" call Dret("s:NetrwRemoteListing")
endfun

"
-----
" s:NetrwRemoteRm: remove/delete a remote file or directory {{{2
fun! s:NetrwRemoteRm(usrhost,path) range
" call Dfunc("s:NetrwRemoteRm(usrhost<".a:usrhost."> path<".a:path.">) virtcol=".virtcol("."))
" call Decho("firstline=".a:firstline." lastline=".a:lastline)
let svpos= netrw#NetrwSavePosn()

let all= 0
if exists("s:netrwmarkfilelist_{bufnr('%')}")
" remove all marked files
" call Decho("remove all marked files with bufnr#".bufnr("%"))
for fname in s:netrwmarkfilelist_{bufnr("%")}
let ok= s:NetrwRemoteRmFile(a:path,fname,all)
if ok =~ 'q%'[uit]
break
elseif ok =~ 'a%'[II]
let all= 1
endif
endfor
call s:NetrwUnmarkList(bufnr("%"),b:netrw_curdir)

else
" remove files specified by range
" call Decho("remove files specified by range")

" preparation for removing multiple files/directories
let ctr= a:firstline

" remove
multiple files and directories
while ctr <= a:lastline
exe ctr
let ok= s:NetrwRemoteRmFile(a:path,s:NetrwGetWord(),all)
if ok =~ 'q%'[uit]
break
elseif ok =~ 'a%'[II]
let all= 1
endif
let ctr= ctr + 1
endwhile

```

```

endif

" refresh the (remote) directory listing
" call Decho("refresh remote directory listing")
call s:NetrwRefresh(0,s:NetrwBrowseChgDir(0,!'/'))
call netrw#NetrwRestorePosn(svpos)

" call Dret("s:NetrwRemoteRm")
endfun

" -----
" s:NetrwRemoteRmFile: {{{2
fun! s:NetrwRemoteRmFile(path,rmfile,all)
" call Dfunc("s:NetrwRemoteRmFile(path<"a:path."> rmfile<".a:rmfile.">) all="a:all)

let all= a:all
let ok = ""

if a:rmfile !~ '^"' && (a:rmfile =~ '@$' || a:rmfile !~ '[\V]$')
" attempt to remove file
" call Decho("attempt to remove file (all=".all.")")
if !all
echohl Statement
" call Decho("case all=0:")

call inputsave()
let ok= input("Confirm deletion of file<"a:rmfile."> ", "[{y(es)},n(o),a(ll),q(uit)] ")
call inputrestore()
echohl NONE
if ok == ""
let ok="no"
endif
let ok= substitute(ok, "[{y(es)},n(o),a(ll),q(uit)]s*", "", 'e')
if ok =~ 'a%[ll]'
let all= 1
endif
endif

if all || ok =~ 'y%[es]' || ok == ""
" call Decho("case all=".all." or ok<".ok.">".(exists("w:netrw_method")? ': netrw_method='w:netrw_method :
""))
if exists("w:netrw_method") && (w:netrw_method == 2 || w:netrw_method == 3)
" call Decho("case ftp:")
let path= a:path
if path =~ '^a\+://^'
let path= substitute(path, '^a\+://^[\^]\+/', "", "")
endif
silent! keepjumps .,$d

```

```

call s:NetrwRemoteFtpCmd(path,"delete ".a:rmfile."")
else
" call Decho("case ssh: g:netrw_rm_cmd<"g:netrw_rm_cmd.">")
let netrw_rm_cmd= s:MakeSshCmd(g:netrw_rm_cmd)
" call Decho("netrw_rm_cmd<".netrw_rm_cmd.">")
if !exists("b:netrw_curdir")
call netrw#ErrorMsg(s:ERROR,"for some reason b:netrw_curdir doesn't exist!",53)
let ok="q"
else
let remotedir= substitute(b:netrw_curdir, '^.*#[^/]\+\/(.*)$', '\1', '')
" call Decho("netrw_rm_cmd<".netrw_rm_cmd.">")
" call Decho("remotedir<".remotedir.">")
" call Decho("rmfile<".a:rmfile.">")
if remotedir != ""
let netrw_rm_cmd= netrw_rm_cmd." ".shellescape(fnamescape(remotedir.a:rmfile))
else
let netrw_rm_cmd= netrw_rm_cmd." ".shellescape(fnamescape(a:rmfile))
endif
" call Decho("call system(".netrw_rm_cmd.")")
let ret= system(netrw_rm_cmd)
if ret != 0
call netrw#ErrorMsg(s:WARNING,"cmd<".netrw_rm_cmd."> failed",60)
endif
" call Decho("returned=".ret." errcode=".v:shell_error)
endif
endif
elseif ok =~ 'q\%[uit]'
" call Decho("ok=="ok)
break
endif

else
" attempt to remove directory
" call Decho("attempt
to remove directory")
if !all
call inputsave()
let ok= input("Confirm deletion of directory<"a:rmfile."> ", "[{y(es)},n(o),a(ll),q(uit)] ")
call inputrestore()
if ok == ""
let ok="no"
endif
let ok= substitute(ok, "[{y(es)},n(o),a(ll),q(uit)]s*", '', 'e')
if ok =~ 'a\%[ll]'
let all= 1
endif
endif
endif

```



```

if all || ok =~ 'y\[es]' || ok == ""
if exists("w:netrw_method") && (w:netrw_method == 2 || w:netrw_method == 3)
call s:NetrwRemoteFtpCmd(a:path,"rmdir ".a:rmfile)
else
let rmfile      = substitute(a:path.a:rmfile,'%$',",")
let netrw_rmdir_cmd = s:MakeSshCmd(s:WinPath(g:netrw_rmdir_cmd)).' '.shellescape(s:WinPath(rmfile))
" call Decho("attempt to remove dir: system(".netrw_rmdir_cmd.")")
let ret= system(netrw_rmdir_cmd)
" call Decho("returned=".ret." errcode=".v:shell_error)

if v:shell_error != 0
" call Decho("v:shell_error not 0")
let netrw_rmfile_cmd=
s:MakeSshCmd(s:WinPath(g:netrw_rmfile_cmd)).' '.shellescape(s:WinPath(substitute(rmfile,['\|$',",','e'])))
" call Decho("2nd attempt to remove dir: system(".netrw_rmfile_cmd.")")
let ret= system(netrw_rmfile_cmd)
" call Decho("returned=".ret." errcode=".v:shell_error)

if v:shell_error != 0 && !exists("g:netrw_quiet")
call netrw#ErrorMsg(s:ERROR,"unable to remove directory<".rmfile."> -- is it empty?",22)
endif
endif
endif

elseif ok =~ 'q\[uit]'
break
endif
endif

" call Dret("s:NetrwRemoteRmFile ".ok)
return ok
endfun

" -----
" s:NetrwRemoteFtpCmd: unfortunately, not all ftp servers honor options for ls {{{2
" This function assumes that a long listing will be received. Size, time,
" and reverse sorts will be requested of the server but not otherwise
" enforced here.
fun! s:NetrwRemoteFtpCmd(path,listcmd)
" call Dfunc("NetrwRemoteFtpCmd(path<".a:path.">
listcmd<".a:listcmd.">) netrw_method=".w:netrw_method)
" call Decho("line($)=" .line("$")." bannercnt=".w:netrw_bannercnt)

" because WinXX ftp uses unix style input
let ffkeep= &ff
setlocal ma ff=unix noro
" call Decho("setlocal ma ff=unix noro")

```

```

" clear off any older non-banner lines
" note that w:netrw_bannercnt indexes the line after the banner
" call Decho('exe silent! keepjumps '.w:netrw_bannercnt.', $d (clear off old non-banner lines)')
exe "silent! keepjumps ".w:netrw_bannercnt.", $d"

".....
if w:netrw_method == 2 || w:netrw_method == 5
" ftp + <.netrc>: Method #2
if a:path != ""
put = 'cd \'' . a:path . '\''
endif
if exists("g:netrw_ftpextracmd")
put = g:netrw_ftpextracmd
" call Decho("filter input: ".getline('.'))
endif
call setline(line("$")+1, a:listcmd)
" exe "keepjumps ".w:netrw_bannercnt.', $g/^./call Decho("ftp#".line("."): ".getline("."))'
if
exists("g:netrw_port") && g:netrw_port != ""
" call Decho("exe ".s:netrw_silentxfer.w:netrw_bannercnt.', $!' . g:netrw_ftp_cmd." -i
".shellescape(g:netrw_machine, 1)." ".shellescape(g:netrw_port, 1))
exe s:netrw_silentxfer." keepjumps ".w:netrw_bannercnt.', $!' . g:netrw_ftp_cmd." -i
".shellescape(g:netrw_machine, 1)." ".shellescape(g:netrw_port, 1)
else
" call Decho("exe ".s:netrw_silentxfer.w:netrw_bannercnt.', $!' . g:netrw_ftp_cmd." -i
".shellescape(g:netrw_machine, 1))
exe s:netrw_silentxfer." keepjumps ".w:netrw_bannercnt.', $!' . g:netrw_ftp_cmd." -i
".shellescape(g:netrw_machine, 1)
endif

".....
elseif w:netrw_method == 3
" ftp + machine, id, passwd, filename: Method #3
setlocal ff=unix
if exists("g:netrw_port") && g:netrw_port != ""
put = 'open '.g:netrw_machine.' '.g:netrw_port
else
put = 'open '.g:netrw_machine
endif

if exists("g:netrw_ftp") && g:netrw_ftp == 1
put = g:netrw_uid
put = '\' . s:netrw_passwd . '\''
else
put = 'user \'' . g:netrw_uid . '\' \'' . s:netrw_passwd . '\''
endif

if a:path != ""

```

```

    put ='cd \'".a:path.\'"
endif
if exists("g:netrw_ftpextracmd")
    put =g:netrw_ftpextracmd
"   call Decho("filter input: ".getline('.'))
endif
call setline(line("$")+1,a:listcmd)

" perform ftp:
" -i      : turns off interactive prompting from ftp
" -n unix : DON'T use <.netrc>, even though it exists
" -n win32: quit being obnoxious about password
"   exe w:netrw_bannercnt!,$g/^./call Decho("ftp#".line("."): ".getline(".)")'
"   call Decho("exe ".s:netrw_silentxfer.w:netrw_bannercnt.",$!".g:netrw_ftp_cmd." -i -n")
exe s:netrw_silentxfer.w:netrw_bannercnt.",$!".g:netrw_ftp_cmd." -i -n"

".....
else
call netrw#ErrorMsg(s:WARNING,"unable to comply with your request<" . choice . ">",23)
endif

" cleanup for Windows
if has("win32") ||
has("win95") || has("win64") || has("win16")
silent! keepjumps %s\r$/e
endif
if a:listcmd == "dir"
" infer directory/link based on the file permission string
silent! keepjumps g/d%\%([-r][-w][-x])\{3}/s@$/@
silent! keepjumps g/l%\%([-r][-w][-x])\{3}/s$/@/
if w:netrw_liststyle == s:THINLIST || w:netrw_liststyle == s:WIDELIST || w:netrw_liststyle == s:TREELIST
exe "silent! keepjumps ".w:netrw_bannercnt.",$s/^%\%(S\+|s\+)\)\{8}/e"
endif
endif

" ftp's listing doesn't seem to include ./ or ../
if !search('^\.\/$\\|s\.\.$','wn')
exe 'keepjumps '.w:netrw_bannercnt
put = './'
endif
if !search('^\.\/$\\|s\.\.\.$','wn')
exe 'keepjumps '.w:netrw_bannercnt
put = '../'
endif

" restore settings
let &ff= ffkeep
" call Dret("NetrwRemoteFtpCmd")

```

```

endfun

" -----
" s:NetrwRemoteRename: rename a remote file or directory {{{2
fun! s:NetrwRemoteRename(usrhost,path)
range
" call Dfunc("NetrwRemoteRename(usrhost<".a:usrhost."> path<".a:path.">")")

" preparation for removing multiple files/directories
let svpos = netrw#NetrwSavePosn()
let ctr = a:firstline
let rename_cmd = s:MakeSshCmd(g:netrw_rename_cmd)

" rename files given by the markfilelist
if exists("s:netrwmarkfilelist_{bufnr('%')}")
for oldname in s:netrwmarkfilelist_{bufnr("%")}
" call Decho("oldname<".oldname.">")
if exists("subfrom")
let newname= substitute(oldname,subfrom,subto,")
" call Decho("subfrom<".subfrom."> subto<".subto."> newname<".newname.">")
else
call inputsave()
let newname= input("Moving ".oldname." to : ",oldname)
call inputrestore()
if newname =~ '^s/'
let subfrom = substitute(newname,'^s^\([^/]*\)/*/$','\1',"
let subto = substitute(newname,'^s/^\([^/]*\)/*/$','\1',"
let newname = substitute(oldname,subfrom,subto,")
" call Decho("subfrom<".subfrom.">
subto<".subto."> newname<".newname.">")
endif
endif

if exists("w:netrw_method") && (w:netrw_method == 2 || w:netrw_method == 3)
call s:NetrwRemoteFtpCmd(a:path,"rename ".oldname." ".newname)
else
let oldname= shellescape(a:path.oldname)
let newname= shellescape(a:path.newname)
" call Decho("system(s:WinPath("rename_cmd.") ".oldname.'"'.newname.'"")
let ret = system(s:WinPath(rename_cmd)'.oldname.'"'.newname)
endif

endifor
call s:NetrwUnMarkFile(1)

else

" attempt to rename files/directories

```

```

while ctr <= a:lastline
  exe "keepjumps ".ctr

  let oldname= s:NetrwGetWord()
"  call Decho("oldname<".oldname.">")

  call inputsave()
  let newname= input("Moving ".oldname." to : ",oldname)
  call inputrestore()

  if exists("w:netrw_method") && (w:netrw_method == 2 || w:netrw_method == 3)
    call s:NetrwRemoteFtpCmd(a:path,"rename ".oldname." ".newname)
  else

  let oldname= shellescape(a:path.oldname)
  let newname= shellescape(a:path.newname)
"  call Decho("system(s:WinPath(".rename_cmd.") ".oldname.' '.newname."))
  let ret = system(s:WinPath(rename_cmd).' '.oldname.' '.newname)
  endif

  let ctr= ctr + 1
endwhile
endif

" refresh the directory
call s:NetrwRefresh(0,s:NetrwBrowseChgDir(0,'/'))
call netrw#NetrwRestorePosn(svpos)

" call Dret("NetrwRemoteRename")
endfun

" -----
" Local Directory Browsing Support: {{{1
" =====

" -----
" netrw#LocalBrowseCheck: {{{2
fun! netrw#LocalBrowseCheck(dirname)
" unfortunate interaction -- split window debugging can't be
" used here, must use D-echoRemOn or D-echoTabOn -- the BufEnter
" event triggers another call to LocalBrowseCheck() when attempts
" to write to the DBG
buffer are made.
" The &ft == "netrw" test was installed because the BufEnter event
" would hit when re-entering netrw windows, creating unexpected
" refreshes (and would do so in the middle of NetrwSaveOptions(), too)
" call Decho("netrw#LocalBrowseCheck: isdir<".a:dirname.">=".isdirectory(a:dirname))
if isdirectory(a:dirname)

```

```

" call Decho(" ft<".&ft."> b:netrw_curdir<".(exists("b:netrw_curdir")? b:netrw_curdir : " doesn't exist").">
dirname<".a:dirname.">". line($)="line("$)")
if &ft != "netrw" || (exists("b:netrw_curdir") && b:netrw_curdir != a:dirname)
  silent! call s:NetrwBrowse(1,a:dirname)
elseif &ft == "netrw" && line("$") == 1
  silent! call s:NetrwBrowse(1,a:dirname)
endif
endif
" not a directory, ignore it
endfun

" -----
" s:LocalListing: does the job of "ls" for local directories {{{2
fun! s:LocalListing()
" call Dfunc("s:LocalListing()")
" call Decho("&ma=".&ma)
"
  call Decho("&mod=".&mod)
" call Decho("&ro=".&ro)
" call Decho("bufname(%)<".bufname("%").">")

" if exists("b:netrw_curdir") |call Decho('b:netrw_curdir<'b:netrw_curdir.">') |else|call Decho("b:netrw_curdir
doesn't exist') |endif
" if exists("g:netrw_sort_by")|call Decho('g:netrw_sort_by<'g:netrw_sort_by.">')|else|call Decho("g:netrw_sort_by
doesn't exist')|endif

" get the list of files contained in the current directory
let dirname = escape(b:netrw_curdir,g:netrw_glob_escape)
if dirname =~ '\.\'
  let dirname = substitute(dirname,['^]*\.\.','.','g')
endif
if dirname == ""
  let dirname = '/'
endif
let dirnamelen = strlen(dirname)
let filelist = glob(s:ComposePath(dirname,"*"))
" call Decho("glob(dirname<".dirname."/ *>)"= filelist)
if filelist != ""
  let filelist= filelist."\n"
endif
let filelist= filelist.glob(s:ComposePath(dirname,"*"))
" call Decho("glob(dirname<".dirname."/ *>)"= filelist)

" Coding
choice: either elide ./ if present
"          or include ./ if not present
if filelist =~ '[\\].[\\]=\(\n\$)'
" elide /path/. from glob() entries if present

```

```

" call Decho("elide /path/. from glob entries if present")
let filelist = substitute(filelist, '\n', 't', 'g')
let filelist = substitute(filelist, '[^\t]+[\\]\.t', ",")
let filelist = substitute(filelist, '[^\t]+[\\]\.$', ",")
let filelist = substitute(filelist, '\t\zs[^\t]+[\\]\.t', ",")
let filelist = substitute(filelist, 't', '\n', 'g')
endif

" call Decho("filelist<".filelist.">")
if filelist !~ '[\V]\.\.[\V]=\(\n|\$)'
  " include ../ in the glob() entry if its missing
" call Decho("forcibly tacking on ..")
let filelist= filelist."n".s:ComposePath(dirname,"../")
" call Decho("filelist<".filelist.">")
endif

if dirname == '/'
  " remove .. from filelist when current directory is root directory
" call Decho("remove .. from filelist")
let filelist= substitute(filelist, '\.\.n', ",")
endif

" remove multiple contiguous newlines
let filelist= substitute(filelist, '\n{2,}', '\n', 'ge')
if !g:netrw_cygwin && (has("win32") || has("win95") || has("win64") || has("win16"))
  " change all \s to /s
" call Decho('change all \s to /s')
let filelist= substitute(filelist, '\s', '/', 'g')
else
  " escape all \s to \\
" call Decho('escape all \s to \\')
let filelist= substitute(filelist, '\s', '\\', 'g')
endif

" call Decho("(before while) dirname<".dirname.">")
" call Decho("(before while) dirnamelen<".dirnamelen.">")
" call Decho("(before while) filelist<".filelist.">")

while filelist != ""
if filelist =~ '\n'
let filename = substitute(filelist, '\n.*$', "", 'e')
let filelist = substitute(filelist, '^.\{-}\n(.*)$', '\1', 'e')
else
let filename = filelist
let filelist = ""
endif

" call Decho(" ")
" call Decho("(while) filelist<".filelist.">")
" call Decho("(while)
filename<".filename.">")

```

```

if filetype(filename) == "link"
  " indicate a symbolic link
" call Decho("indicate <".filename."> is a symbolic link with trailing @")
let pfile= filename."@"

elseif filetype(filename) == "socket"
  " indicate a socket
" call Decho("indicate <".filename."> is a socket with trailing =")
let pfile= filename."="

elseif filetype(filename) == "fifo"
  " indicate a fifo
" call Decho("indicate <".filename."> is a fifo with trailing |")
let pfile= filename."|"

elseif isdirectory(filename)
  " indicate a directory
" call Decho("indicate <".filename."> is a directory with trailing /")
let pfile= filename."/"

elseif exists("b:netrw_curdir") && b:netrw_curdir !~ '^.*://' && !isdirectory(filename)
  if (has("win32") || has("win95") || has("win64") || has("win16"))
    if filename =~ '\.[eE][xX][eE]$\| filename =~ '\.[cC][oO][mM]$\| filename =~ '\.[bB][aA][rR]$\| filename =~ '\.[lL][iN]X$'
      " indicate
an executable
" call Decho("indicate <".filename."> is executable with trailing *")
let pfile= filename."*"
    else
      " normal file
let pfile= filename
    endif
  elseif executable(filename)
    " indicate an executable
" call Decho("indicate <".filename."> is executable with trailing *")
let pfile= filename."*"
    else
      " normal file
let pfile= filename
    endif
  else
    " normal file
let pfile= filename
  endif
" call Decho("pfile<".pfile."> (after *@/ appending)")

if pfile =~ '/'$
  let pfile= substitute(pfile,'/$','/','e')

```



```

" call Decho("change // to /: pfile<".pfile.">")
endif
let pfile= strpart(pfile,dirnamelen)
let pfile= substitute(pfile,'^[\|]',",e")
" call Decho("filename<".filename.">")
" call Decho("pfile <".pfile.">")

if w:netrw_liststyle == s:LONGLIST
let sz = getfsize(filename)
let fsz = strpart(" ",1,15-s:Strlen(sz)).sz
let pfile= pfile."\t".fsz." ".strftime(g:netrw_timefmt,getftime(filename))
" call Decho("sz="".sz." fsz="".fsz")
endif

if g:netrw_sort_by =~ "^t"
" sort by time (handles time up to 1 quintillion seconds, US)
" call Decho("getftime("".filename."")="".getftime(filename)")
let t = getftime(filename)
let ft = strpart("000000000000000000",1,18-s:Strlen(t)).t
" call Decho("exe keepjumps put ="".ft.''.filename.""")
let ftpfile= ft.''.pfile
keepjumps silent! put=ftpfile

elseif g:netrw_sort_by =~ "^s"
" sort by size (handles file sizes up to 1 quintillion bytes, US)
" call Decho("getfsize("".filename."")="".getfsize(filename)")
let sz = getfsize(filename)
let fsz = strpart("000000000000000000",1,18-s:Strlen(sz)).sz
" call Decho("exe keepjumps put ="".fsz.''.filename.""")
let fszpf= fsz.''.pfile
keepjumps silent! put=fszpf

else
" sort by name
" call Decho("exe keepjumps put ="".pfile.""")
keepjumps silent! put=pfile
endif
endwhile

" cleanup any windows mess at end-of-line
silent! keepjumps %s\r$/e
exe "setlocal ts="".g:netrw_maxfilenamelen
" call Decho("setlocal ts="".g:netrw_maxfilenamelen")

" call Dret("s:LocalListing")
endfun

" -----

```

```

" s:LocalBrowseShellCmdRefresh: this function is called after a user has {{2
" performed any shell command. The idea is to cause all local-browsing
" buffers to be refreshed after a user has executed some shell command,
" on the chance that s/he removed/created a file/directory with it.
fun! s:LocalBrowseShellCmdRefresh()
" call Dfunc("LocalBrowseShellCmdRefresh() browselist="(exists("s:netrw_browselist")?
string(s:netrw_browselist) : "empty")." ".tabpagenr("$)." tabs")
" determine which buffers currently reside in a tab
if !exists("s:netrw_browselist")
" call Dret("LocalBrowseShellCmdRefresh : browselist is empty")
return
endif
if !exists("w:netrw_bannercnt")
" call Dret("LocalBrowseShellCmdRefresh : don't refresh when focus not on netrw window")
return
endif
if exists("s:locbrowseshellcmd")
if s:locbrowseshellcmd
let s:locbrowseshellcmd= 0
" call Dret("LocalBrowseShellCmdRefresh : NetrwBrowse itself caused the refresh")
return
endif
let s:locbrowseshellcmd= 0
endif
let itab = 1
let buftablist = []
while itab <= tabpagenr("$")
let buftablist = buftablist + tabpagebuflist()
let itab = itab + 1
tabn
endwhile
" call Decho("buftablist".string(buftablist))
" call Decho("s:netrw_browselist<"(exists("s:netrw_browselist")? string(s:netrw_browselist) : "").">")
" GO through all buffers on netrw_browselist (ie. just local-netrw buffers):
" | refresh any netrw window
" | wipe out any non-displaying netrw buffer
let curwin = winnr()
let ibl = 0
for ibuf in s:netrw_browselist
" call Decho("bufwinnr(".ibuf.")
index(buftablist,".ibuf.")=index(buftablist,ibuf)
if bufwinnr(ibuf) == -1 && index(buftablist,ibuf) == -1
" wipe out any non-displaying netrw buffer
" call Decho("wiping buf#" .ibuf,"<" .bufname(ibuf).">")
exe "silent! bd ".fnameescape(ibuf)
call remove(s:netrw_browselist,ibl)
" call Decho("browselist=".string(s:netrw_browselist))
continue

```

```

elseif index(tabpagebuflist(),ibuf) != -1
    " refresh any netrw buffer
"   call Decho("refresh buf#" .ibuf.'-> win#'.bufwinnr(ibuf))
    exe bufwinnr(ibuf)."wincmd w"
    call s:NetrwRefresh(1,s:NetrwBrowseChgDir(1,'./'))
endif
let ibl= ibl + 1
endfor
exe curwin."wincmd w"

" call Dret("LocalBrowseShellCmdRefresh")
endfun

" -----
" s:NetrwLocalRm: {{{2
fun! s:NetrwLocalRm(path) range
"   call Dfunc("s:NetrwLocalRm(path<".a:path.">")")
"   call Decho("firstline=" .a:firstline." lastline=" .a:lastline)

" preparation for removing multiple files/directories
let ret = 0
let all = 0
let svpos = netrw#NetrwSavePosn()

if exists("s:netrwmarkfilelist_{bufnr('%')}")
    " remove all marked files
"   call Decho("remove all marked files")
    for fname in s:netrwmarkfilelist_{bufnr("%")}
        let ok= s:NetrwLocalRmFile(a:path,fname,all)
        if ok =~ 'q\%[uit]' || ok == "no"
            break
        elseif ok =~ 'a\%[ll]'
            let all= 1
        endif
    endfor
    call s:NetrwUnMarkFile(1)

else
    " remove (multiple) files and directories
"   call Decho("remove files in range [" .a:firstline.", ".a:lastline."]")

    let ctr = a:firstline
    while ctr <= a:lastline
        exe "keepjumps ".ctr

"   sanity checks
        if line(".") < w:netrw_bannercnt
            let ctr= ctr + 1

```

```

    continue
endif
let curword= s:NetrwGetWord()
if curword == "/" || curword == "../"
    let ctr= ctr + 1
    continue
endif
let ok= s:NetrwLocalRmFile(a:path,curword,all)
if ok =~ 'q\[uit]' || ok == "no"
    break
elseif ok =~ 'a\[ll]'
    let all= 1
endif
let ctr= ctr + 1
endwhile
endif

" refresh the directory
" call Decho("bufname<".bufname("%").">")
if bufname("%") != "NetrwMessage"
    call s:NetrwRefresh(1,s:NetrwBrowseChgDir(1,./))
    call netrw#NetrwRestorePosn(svpos)
endif

" call Dret("s:NetrwLocalRm")
endfun

" -----
" s:NetrwLocalRmFile: remove file fname given the path {{2
"         Give confirmation prompt unless all==1
fun! s:NetrwLocalRmFile(path,fname,all)
" call Dfunc("s:NetrwLocalRmFile(path<".a:path."> fname<".a:fname."> all="a:all)

let all= a:all
let ok = ""
norm! 0
let rmfile= s:ComposePath(a:path,a:fname)
" call Decho("rmfile<".rmfile.">")

if rmfile !~ '^"' && (rmfile =~ '@$' || rmfile !~ '[V/$]')
" attempt to remove file
" call Decho("attempt to remove file<".rmfile.">")
if !all
    echohl Statement
    call inputsave()
    let ok= input("Confirm deletion of file<".rmfile."> ", "[y(es)},n(o),a(ll),q(uit)] ")
    call inputrestore()
    echohl NONE

```

```

if ok == ""
  let ok="no"
endif
" call Decho("response: ok<" .ok.">")
let ok= substitute(ok,\[ {y(es)},n(o),a(ll),q(uit)]\s*','e')
" call Decho("response: ok<" .ok."> (after sub)")
if ok =~ 'a\[ll]'
  let all= 1
endif
endif

if all || ok =~ 'y\[es]' || ok == ""
  let ret= s:NetrwDelete(rmfile)
" call Decho("errcode=" .v:shell_error." ret=" .ret)
endif

else
" attempt to remove directory
if !all
  echohl Statement
  call inputsave()
  let ok= input("Confirm deletion of directory<" .rmfile."> ",\[ {y(es)},n(o),a(ll),q(uit)] ")
  call inputrestore()
  let ok= substitute(ok,\[ {y(es)},n(o),a(ll),q(uit)]\s*','e')
  if ok == ""
    let ok="no"
  endif
  if ok =~ 'a\[ll]'
    let all= 1
  endif
endif
endif
let rmfile= substitute(rmfile,'[/]\$',','e')

if all || ok =~ 'y\[es]' || ok == ""
" call Decho("1st attempt: system(s:WinPath(" .g:netrw_local_rmdir.' ) .shellescape(rmfile).' )')
call system(s:WinPath(g:netrw_local_rmdir.' ) .shellescape(rmfile))
" call Decho("v:shell_error=" .v:shell_error)

if v:shell_error != 0
" call Decho("2nd attempt to remove directory<" .rmfile.">")
let errcode= s:NetrwDelete(rmfile)
" call Decho("errcode=" .errcode)

if errcode != 0
  if has("unix")
" call Decho("3rd attempt to remove directory<" .rmfile.">")
call system("rm " .shellescape(rmfile))
if v:shell_error != 0 && !exists("g:netrw_quiet")

```

```

    call netrw#ErrorMsg(s:ERROR,"unable to remove directory<".rmfile."> -- is it empty?",34)
let ok="no"
    endif
    elseif !exists("g:netrw_quiet")
    call netrw#ErrorMsg(s:ERROR,"unable to remove directory<".rmfile."> -- is it empty?",35)
    let ok="no"
    endif
    endif
    endif
    endif
    endif

" call Dret("s:NetrwLocalRmFile ".ok)
return ok
endfun

" -----
" s:NetrwLocalRename: rename a remote file or directory {{{2
fun! s:NetrwLocalRename(path) range
" call Dfunc("NetrwLocalRename(path<".a:path.">)")

" preparation for removing multiple files/directories
let ctr = a:firstline
let svpos= netrw#NetrwSavePosn()

" rename files given by the markfilelist
if exists("s:netrwmarkfilelist_{bufnr('%')}")
for oldname in s:netrwmarkfilelist_{bufnr("%")}
" call Decho("oldname<".oldname.">")
if exists("subfrom")
let newname= substitute(oldname,subfrom,subto,"")
" call Decho("subfrom<".subfrom."> subto<".subto."> newname<".newname.">")
else
call inputsave()
let newname= input("Moving ".oldname." to : ",oldname)
call inputrestore()
if newname =~ '^s/'
let subfrom = substitute(newname,'^s^\([^/]*\)'.*$/','$','\1',"")
let subto = substitute(newname,'^s/^\([^/]*\)'.*$/','$','\1',"")
" call Decho("subfrom<".subfrom."> subto<".subto."> newname<".newname.">")
let newname = substitute(oldname,subfrom,subto,"")
endif
endif
call rename(oldname,newname)
endfor
call s:NetrwUnmarkList(bufnr("%"),b:netrw_curdir)

else

```

```

" attempt to rename files/directories
while ctr <= a:lastline
  exe "keepjumps ".ctr

" sanity checks
if line(".") < w:netrw_bannercnt
  let ctr= ctr + 1
  continue
endif
let curword= s:NetrwGetWord()
if curword == "./" || curword == "../"
  let ctr= ctr + 1
  continue
endif

norm! 0
let oldname= s:ComposePath(a:path,curword)
" call Decho("oldname<".oldname.">")

call inputsave()
let newname= input("Moving ".oldname." to : ",substitute(oldname,'*$',",,e'))
call inputrestore()

call rename(oldname,newname)
" call Decho("renaming
<".oldname."> to <".newname.">")

  let ctr= ctr + 1
endwhile
endif

" refresh the directory
" call Decho("refresh the directory listing")
call s:NetrwRefresh(1,s:NetrwBrowseChgDir(1,./))
call netrw#NetrwRestorePosn(svpos)

" call Dret("NetrwLocalRename")
endfun

" -----
" s:LocalFastBrowser: handles setting up/taking down fast browsing for the local browser {{{2
"
"   g:netrw_  Directory Is
"   fastbrowse Local Remote
" slow 0    D   D   D=Deleting a buffer implies it will not be re-used (slow)
" med  1    D   H   H=Hiding a buffer implies it may be re-used      (fast)
" fast 2    H   H

```

```

"
" Deleting a buffer means that it will be re-loaded when examined, hence "slow".
" Hiding a buffer means that it will be re-used when examined, hence "fast".
" (re-using a buffer may not be as accurate)
fun! s:LocalFastBrowser()
"
    call Dfunc("LocalFastBrowser() g:netrw_fastbrowse=".g:netrw_fastbrowse)

" initialize browselist, a list of buffer numbers that the local browser has used
if !exists("s:netrw_browselist")
" call Decho("initialize s:netrw_browselist")
let s:netrw_browselist= []
endif

" append current buffer to fastbrowse list
if empty(s:netrw_browselist) || bufnr("%") > s:netrw_browselist[-1]
" call Decho("appendng current buffer to browselist")
call add(s:netrw_browselist,bufnr("%"))
" call Decho("browselist=".string(s:netrw_browselist))
endif

" enable autocmd events to handle refreshing/removing local browser buffers
" If local browse buffer is currently showing: refresh it
" If local browse buffer is currently hidden : wipe it
if !exists("s:netrw_browser_shellcmd") && g:netrw_fastbrowse <= 1
" call Decho("setting up local-browser shell command refresh")
let s:netrw_browser_shellcmd= 1
augroup AuNetrwShellCmd
au!
if (has("win32") || has("win95") || has("win64") || has("win16"))
" call Decho("autocmd: ShellCmdPost * call s:LocalBrowseShellCmdRefresh()")
au ShellCmdPost * call s:LocalBrowseShellCmdRefresh()
else
au ShellCmdPost,FocusGained * call s:LocalBrowseShellCmdRefresh()
" call Decho("autocmd: ShellCmdPost,FocusGained * call s:LocalBrowseShellCmdRefresh()")
endif
augroup END
endif

" user must have changed fastbrowse to its fast setting, so remove
" the associated autocmd events
if g:netrw_fastbrowse > 1 && exists("s:netrw_browser_shellcmd")
" call Decho("remove AuNetrwShellCmd autocmd group")
unlet s:netrw_browser_shellcmd
augroup AuNetrwShellCmd
au!
augroup END
augroup! AuNetrwShellCmd

```



```

endif

" call Dret("LocalFastBrowser : browselist<".string(s:netrw_browselist.">")
endfun

" -----
" Support Functions: {{{1
" -----
"
netrw#ErrorMsg: {{{2
" 0=note   = s:NOTE
" 1=warning = s:WARNING
" 2=error  = s:ERROR
" Oct 12, 2008 : max errnum currently is 73
fun! netrw#ErrorMsg(level,msg,errnum)
" call Dfunc("netrw#ErrorMsg(level=".a:level." msg<".a:msg."> errnum=".a:errnum.")
g:netrw_use_errorwindow=".g:netrw_use_errorwindow)

if a:level == 1
  let level= "***warning**" (netrw) "
elseif a:level == 2
  let level= "***error**" (netrw) "
else
  let level= "***note**" (netrw) "
endif
" call Decho("level=".level)

if g:netrw_use_errorwindow
" (default) netrw creates a one-line window to show error/warning
" messages (reliably displayed)

" record current window number for NetrwRestorePosn()'s benefit
let s:winBeforeErr= winnr()
" call Decho("s:winBeforeErr=".s:winBeforeErr)

" getting messages out reliably is just plain difficult!
" This attempt splits the current window, creating a one line window.
if bufexists("NetrwMessage") && bufwinnr("NetrwMessage") > 0
" call Decho("write to NetrwMessage buffer")
exe bufwinnr("NetrwMessage")."wincmd w"
" call Decho("setlocal ma noro")
setlocal ma noro
call setline(line("$")+1,level.a:msg)
$
else
" call Decho("create a NetrwMessage buffer window")
bo 1split

```

```

    anew
    setlocal bt=nofile
    file NetrwMessage
"   call Decho("setlocal ma noro")
    setlocal ma noro
    call setline(line("$"),level.a:msg)
endif
"   call Decho("wrote msg<".level.a:msg."> to NetrwMessage win#".winnr())
if &fo !~ '[ta]'
    syn clear
    syn match netrwMesgNote "\^|*|*note|*|*"
    syn match netrwMesgWarning "\^|*|*warning|*|*"
    syn match netrwMesgError "\^|*|*error|*|*"
    hi link netrwMesgWarning WarningMsg
    hi link netrwMesgError Error
endif
setlocal noma ro bh=wipe

else
" (optional) netrw will show messages using echomsg. Even if the
" message doesn't appear, at least
it'll be recallable via :messages
" redraw!
if a:level == s:WARNING
    echohl WarningMsg
elseif a:level == s:ERROR
    echohl Error
endif
echomsg level.a:msg
"   call Decho("echomsg ***netrw*** ".a:msg)
    echohl None
endif

"   call Dret("netrw#ErrorMsg")
endfun

" -----
" netrw#NetrwRestorePosn: restores the cursor and file position as saved by NetrwSavePosn() {{{2
fun! netrw#NetrwRestorePosn(...)
"   call Dfunc("netrw#NetrwRestorePosn() a:0=".a:0." winnr=".(exists("w:netrw_winnr")? w:netrw_winnr : -1)."
line=".(exists("w:netrw_line")? w:netrw_line : -1)." col=".(exists("w:netrw_col")? w:netrw_col : -1)."
hline=".(exists("w:netrw_hline")? w:netrw_hline : -1))
    let eikeep= &ei
    set ei=all
    if expand("%") == "NetrwMessage"
        exe s:winBeforeErr."wincmd w"
    endif

```

```

if a:0 > 0
  exe a:1
endif

" restore window
if exists("w:netrw_winnr")
"  call Decho("restore window:
exe silent! ".w:netrw_winnr."wincmd w")
  exe "silent! ".w:netrw_winnr."wincmd w"
endif
if v:shell_error == 0
  " as suggested by Bram M: redraw on no error
  " allows protocol error messages to remain visible
"  redraw!
endif

" restore top-of-screen line
if exists("w:netrw_hline")
"  call Decho("restore topofscreen: exe norm! ".w:netrw_hline."G0z")
  exe "norm! ".w:netrw_hline."G0z\<CR>"
endif

" restore position
if exists("w:netrw_line") && exists("w:netrw_col")
"  call Decho("restore posn: exe norm! ".w:netrw_line."G0".w:netrw_col."|")
  exe "norm! ".w:netrw_line."G0".w:netrw_col."|<bar>"
endif

let &ei= eikeep
" call Dret("netrw#NetrwRestorePosn")
endfun

" -----
" netrw#NetrwSavePosn: saves position of cursor on screen {{{2
fun! netrw#NetrwSavePosn()
"  call Dfunc("netrw#NetrwSavePosn()")
" Save current line and column
let w:netrw_winnr= winnr()

let w:netrw_line = line(".")
let w:netrw_col = virtcol(".")

" Save top-of-screen line
norm! H0
let w:netrw_hline= line(".")

" set up string holding position parameters
let ret      = "let w:netrw_winnr=".w:netrw_winnr."|let w:netrw_line=".w:netrw_line."|let

```

```

w:netrw_col=".w:netrw_col."|let w:netrw_hline=".w:netrw_hline

call netrw#NetrwRestorePosn()
" call Dret("netrw#NetrwSavePosn : winnr=".w:netrw_winnr." line=".w:netrw_line." col=".w:netrw_col."
hline=".w:netrw_hline)
return ret
endfun

" -----
" netrw#RFC2396: converts %xx into characters {{{2
fun! netrw#RFC2396(fname)
" call Dfunc("netrw#RFC2396(fname<".a:fname.">")")
let fname = escape(substitute(a:fname, '%\(\x\|x\)', '\=nr2char("0x".submatch(1))', 'ge'), "\t")
" call Dret("netrw#RFC2396 ".fname)
return fname
endfun

" -----
" s:ComposePath: Appends
a new part to a path taking different systems into consideration {{{2
fun! s:ComposePath(base,subdir)
" call Dfunc("s:ComposePath(base<".a:base."> subdir<".a:subdir.">")")

if(has("amiga"))
" call Decho("amiga")
let ec = a:base[strlen(a:base)-1]
if ec != '/' && ec != ':'
let ret = a:base . "/" . a:subdir
else
let ret = a:base . a:subdir
endif

elseif a:subdir =~ '\^a:[^\[\]^\\]' && (has("win32") || has("win95") || has("win64") || has("win16"))
" call Decho("windows")
let ret= a:subdir

elseif a:base =~ '\^a\+://'
" call Decho("remote linux/macos")
let urlbase = substitute(a:base, '\^(\a\+://\{-}\^)(\.*\)$', '\1', '')
let curpath = substitute(a:base, '\^(\a\+://\{-}\^)(\.*\)$', '\2', '')
if a:subdir == './'
if curpath =~ '[^/][^/]\+/$'
let curpath= substitute(curpath, '[^/]\+/$', '')
else
let curpath=""
endif
let ret= urlbase.curpath
else

```

```

    let ret= urlbase.curpath.a:subdir
endif
"
    call Decho("urlbase<".urlbase.">")
" call Decho("curpath<".curpath.">")
" call Decho("ret<".ret.">")

else
" call Decho("local linux/macos")
let ret = substitute(a:base."/".a:subdir,"//","/", "g")
if a:base =~ '^/'
    " keeping initial '/' for the benefit of network share listing support
    let ret= '/' .ret
endif
let ret= simplify(ret)
endif

" call Dret("s:ComposePath ".ret)
return ret
endfun

" -----
" s:FileReadable: o/s independent filereadable {{{2
fun! s:FileReadable(fname)
" call Dfunc("s:FileReadable(fname<".a:fname.">")

if g:netrw_cygwin
    let ret= filereadable(substitute(a:fname,'/cygdrive/^(.)','\1:',"))
else
    let ret= filereadable(a:fname)
endif

" call Dret("s:FileReadable ".ret)
return ret
endfun

" -----
" s:GetTempfile: gets a tempname that'll work for various
o/s's {{{2
"     Places correct suffix on end of temporary filename,
"     using the suffix provided with fname
fun! s:GetTempfile(fname)
" call Dfunc("s:GetTempfile(fname<".a:fname.">")

if !exists("b:netrw_tmpfile")
" get a brand new temporary filename
let tmpfile= tempname()
" call Decho("tmpfile<".tmpfile."> : from tempname()")

```

```

let tmpfile= substitute(tmpfile,'\','ge')
" call Decho("tmpfile<".tmpfile."> : chgd any \\ -> /")

" sanity check -- does the temporary file's directory exist?
if !isdirectory(substitute(tmpfile,['^/]+\$',','e'))
" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
call netrw#ErrorMsg(s:ERROR,"your <".substitute(tmpfile,['^/]+\$',','e')."> directory is missing!",2)
" call Dret("s:GetTempfile getcwd<".getcwd().">")
return ""
endif

" let netrw#NetSource() know about the tmpfile
let s:netrw_tmpfile= tmpfile " used by netrw#NetSource() and netrw#NetrwBrowseX()
"
call Decho("tmpfile<".tmpfile."> s:netrw_tmpfile<".s:netrw_tmpfile.">")

" o/s dependencies
if g:netrw_cygwin != 0
let tmpfile = substitute(tmpfile,'^\(\\a\):!;/cygdrive/1','e')
elseif has("win32") || has("win95") || has("win64") || has("win16")
if !exists("+shellslash") || !&ssl
let tmpfile = substitute(tmpfile,'/','\','g')
endif
else
let tmpfile = tmpfile
endif
let b:netrw_tmpfile= tmpfile
" call Decho("o/s dependent fixed tempname<".tmpfile.">")
else
" re-use temporary filename
let tmpfile= b:netrw_tmpfile
" call Decho("tmpfile<".tmpfile."> re-using")
endif

" use fname's suffix for the temporary file
if a:fname != ""
if a:fname =~ '\.[^./]+\$$'
" call Decho("using fname<".a:fname.">'s suffix")
if a:fname =~ '.tar.gz' || a:fname =~ '.tar.bz2'
let suffix = ".tar".substitute(a:fname,'^.*\(\.[^./]+\)\$',\1,'e')
else
let suffix = substitute(a:fname,'^.*\(\.[^./]+\)\$',\1,'e')
endif
" call Decho("suffix<".suffix.">")
let tmpfile= substitute(tmpfile,'\.tmp$',','e')
" call Decho("chgd tmpfile<".tmpfile."> (removed any .tmp suffix)")
let tmpfile .= suffix

```

```

" call Decho("chgd tmpfile<".tmpfile."> (added ".suffix." suffix) netrw_fname<".b:netrw_fname.">")
  let s:netrw_tmpfile= tmpfile " supports netrw#NetSource()
endif
endif

" call Decho("ro=".&l:ro." ma=".&l:ma." mod=".&l:mod." wrap=".&l:wrap)
" call Dret("s:GetTempfile <".tmpfile.">")
return tmpfile
endfun

" -----
" s:MakeSshCmd: transforms input command using USEPORT HOSTNAME into {{{2
"       a correct command for use with a system() call
fun! s:MakeSshCmd(sshcmd)
" call Dfunc("s:MakeSshCmd(sshcmd<".a:sshcmd.">) user<".s:user."> machine<".s:machine.">")
let sshcmd = substitute(a:sshcmd,\,s:user.s:machine,")
if exists("g:netrw_port") && g:netrw_port
!= ""
  let sshcmd= substitute(sshcmd,"USEPORT",g:netrw_sshport.' 'g:netrw_port,")
elseif exists("s:port") && s:port != ""
  let sshcmd= substitute(sshcmd,"USEPORT",g:netrw_sshport.' 's:port,")
else
  let sshcmd= substitute(sshcmd,"USEPORT ","",")
endif
" call Dret("s:MakeSshCmd <".sshcmd.">")
return sshcmd
endfun

" -----
" s:NetrwBMSHOW: {{{2
fun! s:NetrwBMSHOW()
" call Dfunc("s:NetrwBMSHOW()")
redir => bmsHOWraw
menu
redir END
let bmsHOWlist = split(bmsHOWraw,\)
if bmsHOWlist != []
  let bmsHOWfuncs= filter(bmsHOWlist,v:val =~ "<SNR>\\d\\+_BMSHOW()")
  if bmsHOWfuncs != []
    let bmsHOWfunc = substitute(bmsHOWfuncs[0],'^.*:\\(call.*BMSHOW()\\).*$',\\1,")
    if bmsHOWfunc =~ '^call.*BMSHOW()'
      exe "silent! ".bmsHOWfunc
    endif
  endif
endif
" call Dret("s:NetrwBMSHOW : bmsHOWfunc<".(exists("bmsHOWfunc")? bmsHOWfunc : 'n/a').">")
endfun

```

```

"
-----
" s:NetrwDelete: Deletes a file. {{{2
"     Uses Steve Hall's idea to insure that Windows paths stay
"     acceptable. No effect on Unix paths.
" Examples of use: let result= s:NetrwDelete(path)
fun! s:NetrwDelete(path)
" call Dfunc("s:NetrwDelete(path<"a:path.">)")

let path = s:WinPath(a:path)
if !g:netrw_cygwin && (has("win32") || has("win95") || has("win64") || has("win16"))
if exists("+shellslash")
let sskip= &shellslash
setlocal noshellslash
let result = delete(path)
let &shellslash = sskip
else
" call Decho("exe let result= ".a:cmd."("".path."")")
let result= delete(path)
endif
else
" call Decho("let result= delete("".path."")")
let result= delete(path)
endif
if result < 0
call netrw#ErrorMsg(s:WARNING,"delete("".path."") failed!",71)
endif

" call Dret("s:NetrwDelete ".result)
return result
endfun

" -----
"
s:NetrwEnew: opens a new buffer, passes netrw buffer variables through {{{2
fun! s:NetrwEnew(curdir)
" call Dfunc("s:NetrwEnew(curdir<"a:curdir.">) buf#"bufnr("%")."<"bufname("%").">")

" grab a function-local-variable copy of buffer variables
if exists("b:netrw_bannercnt") |let netrw_bannercnt = b:netrw_bannercnt |endif
if exists("b:netrw_browser_active") |let netrw_browser_active = b:netrw_browser_active |endif
if exists("b:netrw_cpf") |let netrw_cpf = b:netrw_cpf |endif
if exists("b:netrw_curdir") |let netrw_curdir = b:netrw_curdir |endif
if exists("b:netrw_explore_bufnr") |let netrw_explore_bufnr = b:netrw_explore_bufnr |endif
if exists("b:netrw_explore_indx") |let netrw_explore_indx = b:netrw_explore_indx |endif
if exists("b:netrw_explore_line") |let netrw_explore_line = b:netrw_explore_line
|endif
if exists("b:netrw_explore_list") |let netrw_explore_list = b:netrw_explore_list |endif

```



```

if exists("b:netrw_explore_listlen")|let netrw_explore_listlen = b:netrw_explore_listlen|endif
if exists("b:netrw_explore_mtchcnt")|let netrw_explore_mtchcnt = b:netrw_explore_mtchcnt|endif
if exists("b:netrw_fname")      |let netrw_fname      = b:netrw_fname      |endif
if exists("b:netrw_lastfile")   |let netrw_lastfile   = b:netrw_lastfile   |endif
if exists("b:netrw_liststyle")  |let netrw_liststyle  = b:netrw_liststyle  |endif
if exists("b:netrw_method")     |let netrw_method     = b:netrw_method     |endif
if exists("b:netrw_option")     |let netrw_option     = b:netrw_option     |endif
if exists("b:netrw_prvdir")     |let netrw_prvdir     = b:netrw_prvdir     |endif

call s:NetrwOptionRestore("w:")
" call Decho("generate a buffer with keepjumps keepalt anew!")
keepjumps
keepalt anew!
call s:NetrwOptionSave("w:")

" copy function-local-variables to buffer variable equivalents
if exists("netrw_bannercnt")    |let b:netrw_bannercnt    = netrw_bannercnt    |endif
if exists("netrw_browser_active")|let b:netrw_browser_active = netrw_browser_active |endif
if exists("netrw_cpf")         |let b:netrw_cpf         = netrw_cpf         |endif
if exists("netrw_curdir")      |let b:netrw_curdir      = netrw_curdir      |endif
if exists("netrw_explore_bufnr")|let b:netrw_explore_bufnr = netrw_explore_bufnr |endif
if exists("netrw_explore_indx")|let b:netrw_explore_indx  = netrw_explore_indx  |endif
if exists("netrw_explore_line")|let b:netrw_explore_line  = netrw_explore_line  |endif
if exists("netrw_explore_list")|let b:netrw_explore_list  = netrw_explore_list  |endif
if exists("netrw_explore_listlen")|let b:netrw_explore_listlen = netrw_explore_listlen|endif
if exists("netrw_explore_mtchcnt")|let
b:netrw_explore_mtchcnt = netrw_explore_mtchcnt|endif
if exists("netrw_fname")      |let b:netrw_fname      = netrw_fname      |endif
if exists("netrw_lastfile")   |let b:netrw_lastfile   = netrw_lastfile   |endif
if exists("netrw_liststyle")  |let b:netrw_liststyle  = netrw_liststyle  |endif
if exists("netrw_method")     |let b:netrw_method     = netrw_method     |endif
if exists("netrw_option")     |let b:netrw_option     = netrw_option     |endif
if exists("netrw_prvdir")     |let b:netrw_prvdir     = netrw_prvdir     |endif

let b:netrw_curdir= a:curdir
if b:netrw_curdir =~ '/'$'
if exists("w:netrw_liststyle") && w:netrw_liststyle == s:TREELIST
file NetrwTreeListing
nno <silent> <buffer> [ :silent call <SID>TreeListMove([']<cr>
nno <silent> <buffer> ] :silent call <SID>TreeListMove(']<cr>
else
exe "silent! keepalt file ".fnameescape(b:netrw_curdir)
endif
endif

" call Dret("s:NetrwEnew : buf#".bufnr("%")."<".bufname("%")."> expand(%)<".expand("%").">
expand(#)<".expand("#").">")
endfun

```

```

" -----
" s:NetrwSaveWordPosn: used to keep cursor on same word after refresh, {{{2
" changed sorting, etc. Also see s:NetrwRestoreWordPosn().
fun! s:NetrwSaveWordPosn()
" call Dfunc("NetrwSaveWordPosn()")
let s:netrw_saveword= '^'.fnameescape(getline('.')).'$'
" call Dret("NetrwSaveWordPosn : saveword<".s:netrw_saveword.">")
endfun

" -----
" s:NetrwRestoreWordPosn: used to keep cursor on same word after refresh, {{{2
" changed sorting, etc. Also see s:NetrwSaveWordPosn().
fun! s:NetrwRestoreWordPosn()
" call Dfunc("NetrwRestoreWordPosn()")
silent! call search(s:netrw_saveword,'w')
" call Dret("NetrwRestoreWordPosn")
endfun

" -----
"
s:RestoreBufVars: {{{2
fun! s:RestoreBufVars()
" call Dfunc("s:RestoreBufVars()")

if exists("s:netrw_curdir") |let b:netrw_curdir = s:netrw_curdir |endif
if exists("s:netrw_lastfile") |let b:netrw_lastfile = s:netrw_lastfile |endif
if exists("s:netrw_method") |let b:netrw_method = s:netrw_method |endif
if exists("s:netrw_fname") |let b:netrw_fname = s:netrw_fname |endif
if exists("s:netrw_machine") |let b:netrw_machine = s:netrw_machine |endif
if exists("s:netrw_browser_active")|let b:netrw_browser_active = s:netrw_browser_active|endif

" call Dret("s:RestoreBufVars")
endfun

" -----
" s:RemotePathAnalysis: {{{2
fun! s:RemotePathAnalysis(dirname)
" call Dfunc("s:RemotePathAnalysis()")

let dirpat = '^(\w\{-})/^\(\w\|+@\)\|=\([\^:#]\|+\)\%([:#]\(\d\|+\)\)\|=\(\.*\)$'
let s:method = substitute(a:dirname,dirpat,'1',"")
let s:user = substitute(a:dirname,dirpat,'2',"")
let s:machine = substitute(a:dirname,dirpat,'3',"")
let s:port = substitute(a:dirname,dirpat,'4',"")
let s:path = substitute(a:dirname,dirpat,'5',"")
let s:fname = substitute(a:dirname,'^.*\ze.','',"")

```

```

" call Decho("set up s:method <".s:method.">")
" call Decho("set up s:user <".s:user.">")
" call Decho("set up s:machine<".s:machine.">")
" call Decho("set up s:port <".s:port.">")
" call Decho("set up s:path <".s:path.">")
" call Decho("set up s:fname <".s:fname.">")

" call Dret("s:RemotePathAnalysis")
endfun

" -----
" s:RemoteSystem: runs a command on a remote host using ssh {{{2
"     Returns status
" Runs system() on
" [cd REMOTEDIRPATH;] a:cmd
" Note that it doesn't do shellescape(a:cmd)!
fun! s:RemoteSystem(cmd)
"
    call Dfunc("s:RemoteSystem(cmd<".a:cmd.">")")
    if !executable(g:netrw_ssh_cmd)
        call netrw#ErrorMsg(s:ERROR,"g:netrw_ssh_cmd<".g:netrw_ssh_cmd."> is not executable!",52)
    elseif !exists("b:netrw_curdir")
        call netrw#ErrorMsg(s:ERROR,"for some reason b:netrw_curdir doesn't exist!",53)
    else
        let cmd = s:MakeSshCmd(g:netrw_ssh_cmd." USEPORT HOSTNAME")
        let remotedir= substitute(b:netrw_curdir,'^.*#[^/]\+/\^(.*)$',\1,")
        if remotedir != ""
            let cmd= cmd.' cd '.shellescape(remotedir).";"
        else
            let cmd= cmd.' '
        endif
        let cmd= cmd.a:cmd
" call Decho("call system(".cmd.")")
        let ret= system(cmd)
    endif
" call Dret("s:RemoteSystem ".ret)
    return ret
endfun

" -----
" s:RestoreWinVars: (used by Explore() and NetrwSplit()) {{{2
fun! s:RestoreWinVars()
" call Dfunc("s:RestoreWinVars()")
if exists("s:bannercnt") |let w:netrw_bannercnt
= s:bannercnt |unlet s:bannercnt |endif
if exists("s:col") |let w:netrw_col = s:col |unlet s:col |endif
if exists("s:curdir") |let w:netrw_curdir = s:curdir |unlet s:curdir |endif
if exists("s:explore_bufnr") |let w:netrw_explore_bufnr = s:explore_bufnr |unlet s:explore_bufnr |endif

```

```

if exists("s:explore_indx") |let w:netrw_explore_indx = s:explore_indx |unlet s:explore_indx |endif
if exists("s:explore_line") |let w:netrw_explore_line = s:explore_line |unlet s:explore_line |endif
if exists("s:explore_listlen")|let w:netrw_explore_listlen = s:explore_listlen|unlet s:explore_listlen|endif
if exists("s:explore_list") |let w:netrw_explore_list = s:explore_list |unlet s:explore_list |endif
if exists("s:explore_mtchcnt")|let w:netrw_explore_mtchcnt = s:explore_mtchcnt|unlet s:explore_mtchcnt|endif
if exists("s:fpl")          |let w:netrw_fpl
    = s:fpl          |unlet s:fpl          |endif
if exists("s:hline")      |let w:netrw_hline      = s:hline      |unlet s:hline      |endif
if exists("s:line")      |let w:netrw_line      = s:line      |unlet s:line      |endif
if exists("s:liststyle") |let w:netrw_liststyle = s:liststyle |unlet s:liststyle |endif
if exists("s:method")    |let w:netrw_method    = s:method    |unlet s:method    |endif
if exists("s:prvdir")    |let w:netrw_prvdir    = s:prvdir    |unlet s:prvdir    |endif
if exists("s:treedict")  |let w:netrw_treedict  = s:treedict  |unlet s:treedict  |endif
if exists("s:treetop")   |let w:netrw_treetop   = s:treetop   |unlet s:treetop   |endif
if exists("s:winnr")     |let w:netrw_winnr     = s:winnr     |unlet s:winnr     |endif
" call Dret("s:RestoreWinVars")
endfun

```

"

"s:Rexplore: implements returning from a buffer to a netrw directory {{{2

"

" s:SetRexDir() sets up <2-leftmouse> maps (if g:netrw_retmap
" is true) and a command, :Rexplore, which call this function.

"

" s:nbcd_curpos_{bufnr('%')} is set up by s:NetrwBrowseChgDir()

fun! s:NetrwRexplore(islocal,dirname)

" call Dfunc("s:NetrwRexplore(islocal="a:islocal." dirname<"a:dirname.">")

if a:islocal

call netrw#LocalBrowseCheck(a:dirname)

else

call s:NetrwBrowse(0,a:dirname)

endif

if exists("s:nbcd_curpos_{bufnr('%')}")

call netrw#NetrwRestorePosn(s:nbcd_curpos_{bufnr('%')})

unlet s:nbcd_curpos_{bufnr('%')}

endif

" call Dret("s:NetrwRexplore")

endfun

"

"s:SaveBufVars: {{{2

fun! s:SaveBufVars()

" call Dfunc("s:SaveBufVars()")

if exists("b:netrw_curdir") |let

s:netrw_curdir = b:netrw_curdir |endif

if exists("b:netrw_lastfile") |let s:netrw_lastfile = b:netrw_lastfile |endif

```

if exists("b:netrw_method") |let s:netrw_method = b:netrw_method |endif
if exists("b:netrw_fname") |let s:netrw_fname = b:netrw_fname |endif
if exists("b:netrw_machine") |let s:netrw_machine = b:netrw_machine |endif
if exists("b:netrw_browser_active")|let s:netrw_browser_active = b:netrw_browser_active|endif

```

```

" call Dret("s:SaveBufVars")
endfun

```

```

" -----
" s:SaveWinVars: (used by Explore() and NetrwSplit()) {{{2

```

```

fun! s:SaveWinVars()
" call Dfunc("s:SaveWinVars()")
if exists("w:netrw_bannercnt") |let s:bannercnt = w:netrw_bannercnt |endif
if exists("w:netrw_col") |let s:col = w:netrw_col |endif
if exists("w:netrw_curdir")
|let s:curdir = w:netrw_curdir |endif
if exists("w:netrw_explore_bufnr") |let s:explore_bufnr = w:netrw_explore_bufnr |endif
if exists("w:netrw_explore_indx") |let s:explore_indx = w:netrw_explore_indx |endif
if exists("w:netrw_explore_line") |let s:explore_line = w:netrw_explore_line |endif
if exists("w:netrw_explore_listlen")|let s:explore_listlen = w:netrw_explore_listlen|endif
if exists("w:netrw_explore_list") |let s:explore_list = w:netrw_explore_list |endif
if exists("w:netrw_explore_mtchcnt")|let s:explore_mtchcnt = w:netrw_explore_mtchcnt|endif
if exists("w:netrw_fpl") |let s:fpl = w:netrw_fpl |endif
if exists("w:netrw_hline") |let s:hline = w:netrw_hline |endif
if exists("w:netrw_line") |let s:line = w:netrw_line |endif
if exists("w:netrw_liststyle") |let s:liststyle = w:netrw_liststyle |endif
if
exists("w:netrw_method") |let s:method = w:netrw_method |endif
if exists("w:netrw_prvdir") |let s:prvdir = w:netrw_prvdir |endif
if exists("w:netrw_treedict") |let s:treedict = w:netrw_treedict |endif
if exists("w:netrw_treetop") |let s:treetop = w:netrw_treetop |endif
if exists("w:netrw_winnr") |let s:winnr = w:netrw_winnr |endif
" call Dret("s:SaveWinVars")
endfun

```

```

" -----
" s:SetBufWinVars: (used by NetrwBrowse() and LocalBrowseCheck()) {{{2

```

```

" To allow separate windows to have their own activities, such as
" Explore **/pattern, several variables have been made window-oriented.
" However, when the user splits a browser window (ex: ctrl-w s), these
" variables are not inherited by the new window. SetBufWinVars() and
" UseBufWinVars() get around that.

```

```

fun! s:SetBufWinVars()
"
call Dfunc("s:SetBufWinVars()")
if exists("w:netrw_liststyle") |let b:netrw_liststyle = w:netrw_liststyle |endif
if exists("w:netrw_bannercnt") |let b:netrw_bannercnt = w:netrw_bannercnt |endif
if exists("w:netrw_method") |let b:netrw_method = w:netrw_method |endif

```

```

if exists("w:netrw_prvdir") |let b:netrw_prvdir = w:netrw_prvdir |endif
if exists("w:netrw_explore_idx") |let b:netrw_explore_idx = w:netrw_explore_idx |endif
if exists("w:netrw_explore_listlen")|let b:netrw_explore_listlen= w:netrw_explore_listlen|endif
if exists("w:netrw_explore_mtchcnt")|let b:netrw_explore_mtchcnt= w:netrw_explore_mtchcnt|endif
if exists("w:netrw_explore_bufnr") |let b:netrw_explore_bufnr = w:netrw_explore_bufnr |endif
if exists("w:netrw_explore_line") |let b:netrw_explore_line = w:netrw_explore_line |endif
if exists("w:netrw_explore_list") |let b:netrw_explore_list =
w:netrw_explore_list |endif
" call Dret("s:SetBufWinVars")
endfun

```

```

" -----
" s:SetRexDir: set directory for :Rexplore {{{2
fun! s:SetRexDir(islocal,dirname)
" call Dfunc("s:SetRexDir(islocal=".a:islocal." dirname<"a:dirname.">")")
" set up Rex and leftmouse-double-click
if a:islocal
exe 'com! Rexplore call s:NetrwRexplore(1,".escape(a:dirname,"\").")'
if g:netrw_retmap
if !hasmapto("<Plug>NetrwReturn") && maparg("<2-leftmouse>","n") == ""
nmap <unique> <silent> <2-leftmouse> <Plug>NetrwReturn
endif
let dir = escape(a:dirname, s:netrw_map_escape)
exe 'nnoremap <silent> <Plug>NetrwReturn :call <SID>NetrwRexplore(1,".dir.")<cr>'
endif
else
exe 'com! Rexplore call s:NetrwRexplore(0,".escape(a:dirname,"\").")'
if g:netrw_retmap
if !hasmapto("<Plug>NetrwReturn") && maparg("<2-leftmouse>","n") == ""
nmap <unique> <silent> <2-leftmouse> <Plug>NetrwReturn
endif
let dir = escape(a:dirname, s:netrw_map_escape)
exe 'nnoremap <silent> <Plug>NetrwReturn :call <SID>NetrwRexplore(0,".dir.")<cr>'
endif
endif
" call Dret("s:SetRexDir")
endfun

```

```

" -----
" s:Strlen: this function returns the length of a string, even if its {{{2
" using two-byte etc characters.
" Currently, its only used if g:Align_xstrlen is set to a
" nonzero value. Solution from Nicolai Weibull, vim docs
" (:help strlen()), Tony Mechelynck, and my own invention.
fun! s:Strlen(x)
" call Dfunc("s:Strlen(x<"a:x.">")")
if g:netrw_xstrlen == 1
" number of codepoints (Latin a + combining circumflex is two codepoints)

```

```

" (comment from TM, solution from NW)
let ret= strlen(substitute(a:x, '.', 'c', 'g'))

elseif g:netrw_xstrlen == 2
" number of spacing codepoints (Latin a + combining circumflex is one spacing
" codepoint;
a hard tab is one; wide and narrow CJK are one each; etc.)
" (comment from TM, solution from TM)
let ret=strlen(substitute(a:x, '\Z', 'x', 'g'))

elseif g:netrw_xstrlen == 3
" virtual length (counting, for instance, tabs as anything between 1 and
" 'tabstop', wide CJK as 2 rather than 1, Arabic alif as zero when immediately
" preceded by lam, one otherwise, etc.)
" (comment from TM, solution from me)
let modkeep= &mod
exe "norm! o\<esc>"
call setline(line("."),a:x)
let ret= virtcol("$") - 1
d
let &mod= modkeep

else
" at least give a decent default
ret= strlen(a:x)
endif
" call Dret("s:Strlen ".ret)
return ret
endfun

" -----
" s:TreeListMove: {{{2
fun! s:TreeListMove(dir)
" call Dfunc("s:TreeListMove(dir<"a:dir.">")")
let curline = getline('.')
let prvline = (line(".") > 1)? getline(line(".")-1) : "
let nxtline = (line(".")
< line("$"))? getline(line")+1) : "
let curindent= substitute(curline, '^(\[ ]*)\{-}$', '\1', '')
let indentm1 = substitute(curindent, '^|', '', '')
" call Decho("prvline <".prvline."> #" .line(".")-1)
" call Decho("curline <".curline."> #" .line("."))
" call Decho("nxtline <".nxtline."> #" .line")+1)
" call Decho("curindent<".curindent.">")
" call Decho("indentm1 <".indentm1.">")

if curline !~ '$'
" call Decho('regfile')

```

```

if a:dir == '[' && prvline != "
    norm! 0
    let nl = search('^.\indentm1.[^\]', 'bWe') " search backwards from regular file
"    call Decho("regfile srch back: ".nl)
elseif a:dir == ']' && nxtline != "
    norm! $
    let nl = search('^.\indentm1.[^\]', 'We') " search forwards from regular file
"    call Decho("regfile srch fwd: ".nl)
endif

elseif a:dir == '[' && prvline != "
    norm! 0
    let curline= line(".")
    let nl = search('^.\curindent.[^\]', 'bWe') " search backwards From
directory, same indentation
"    call Decho("dir srch back ind: ".nl)
    if nl != 0
        if line(".") == curline-1
            let nl= search('^.\indentm1.[^\]', 'bWe') " search backwards from directory, indentation - 1
"        call Decho("dir srch back ind-1: ".nl)
        endif
    endif

elseif a:dir == ']' && nxtline != "
    norm! $
    let curline = line(".")
    let nl = search('^.\curindent.[^\]', 'We') " search forwards from directory, same indentation
"    call Decho("dir srch fwd ind: ".nl)
    if nl != 0
        if line(".") == curline+1
            let nl= search('^.\indentm1.[^\]', 'We') " search forwards from directory, indentation - 1
"        call Decho("dir srch fwd ind-1: ".nl)
        endif
    endif

endif

" call Dret("s:TreeListMove")
endfun

" -----
" s:UpdateBuffersMenu: does emenu Buffers.Refresh (but due to locale, the menu item may not be called that) {{{2
"     The
"     Buffers.Refresh menu calls s:BMSHow(); unfortunately, that means that that function
"     can't be called except via emenu. But due to locale, that menu line may not be called
"     Buffers.Refresh; hence, s:NetrwBMSHow() utilizes a "cheat" to call that function anyway.
fun! s:UpdateBuffersMenu()
" call Dfunc("s:UpdateBuffersMenu()")

```



```

if has("gui") && has("menu") && has("gui_running") && &go =~ 'm'
  try
    silent emenu Buffers.Refresh\ menu
  catch /^Vim\%((\a+)\)=:E/
    let v:errmsg= ""
    silent call s:NetrwBMShow()
  endtry
endif
" call Dret("s:UpdateBuffersMenu")
endfun

" -----
" s:UseBufWinVars: (used by NetrwBrowse() and LocalBrowseCheck()) {{{2
"   Matching function to BufferWinVars()
fun! s:UseBufWinVars()
" call Dfunc("s:UseBufWinVars()")
if exists("b:netrw_liststyle") && !exists("w:netrw_liststyle") |let w:netrw_liststyle
    = b:netrw_liststyle |endif
if exists("b:netrw_bannercnt") && !exists("w:netrw_bannercnt") |let w:netrw_bannercnt =
b:netrw_bannercnt |endif
if exists("b:netrw_method") && !exists("w:netrw_method") |let w:netrw_method =
b:netrw_method |endif
if exists("b:netrw_prvdir") && !exists("w:netrw_prvdir") |let w:netrw_prvdir = b:netrw_prvdir
|endif
if exists("b:netrw_explore_idx") && !exists("w:netrw_explore_idx") |let w:netrw_explore_idx =
b:netrw_explore_idx |endif
if exists("b:netrw_explore_listlen") && !exists("w:netrw_explore_listlen")|let w:netrw_explore_listlen =
b:netrw_explore_listlen|endif
if exists("b:netrw_explore_mtchcnt") && !exists("w:netrw_explore_mtchcnt")|let w:netrw_explore_mtchcnt =
b:netrw_explore_mtchcnt|endif
if exists("b:netrw_explore_bufnr") && !exists("w:netrw_explore_bufnr") |let w:netrw_explore_bufnr =
b:netrw_explore_bufnr
|endif
if exists("b:netrw_explore_line") && !exists("w:netrw_explore_line") |let w:netrw_explore_line =
b:netrw_explore_line |endif
if exists("b:netrw_explore_list") && !exists("w:netrw_explore_list") |let w:netrw_explore_list =
b:netrw_explore_list |endif
" call Dret("s:UseBufWinVars")
endfun

" -----
" s:WinPath: {{{2
fun! s:WinPath(path)
" call Dfunc("s:WinPath(path<"a:path.">)")
if !g:netrw_cygwin && (has("win32") || has("win95") || has("win64") || has("win16"))
" remove trailing slash (Win95)
let path = substitute(a:path, "\\(\\|/)$", "", 'g')
" remove escaped spaces

```

```

let path = substitute(path, '\', '/', 'g')
" convert slashes to backslashes
let path = substitute(path, '/', '\', 'g')
else
let path= a:path
endif
" call Dret("s:WinPath <" .path. ">")
return path
endfun

```

```

" -----
"
Settings Restoration: {{{2
let &cpo= s:keepcpo
unlet s:keepcpo

```

```

" -----
" Modelines: {{{1
" vim:ts=8 fdm=marker
en_US
20040623 release.
--

```

This dictionary is based on a subset of the original English wordlist created by Kevin Atkinson for Pspell and Aspell and thus is covered by his original LGPL license. The affix file is a heavily modified version of the original english.aff file which was released as part of Geoff Kuenning's Ispell and as such is covered by his BSD license.

Thanks to both authors for there wonderful work.

```

=====

```

en_AU:
This dictionary was based on the en_GB Myspell dictionary which in turn was initially based on a subset of the original English wordlist created by Kevin Atkinson for Pspell and Aspell and thus is covered by his original LGPL licence.

The credit for this en_AU dictionary goes to:

Kelvin Eldridge (maintainer)
Jean Hollis Weber
David Wilson

- Words incorrect in Australian English removed

- a list from the previously removed words with corrected spelling was added
- a list of major rivers was added
- a list of place names was added
- a list of Australian mammals was added
- a list of Aboriginal/Koori words commonly used was added

A total of 119,267 words are now recognized by the dictionary.

Of course, special thanks go to the editors of the en_GB dictionary (David Bartlett, Brian Kelk and Andrew Brown) which provided the starting point for this dictionary.

The affix file is currently a duplicate of the en_AU.aff created completely from scratch by David Bartlett and Andrew Brown, based on the published rules for MySpell and is also provided under the LGPL.

If you find omissions or bugs or have new words to add to the dictionary, please contact the en_AU maintainer at:

"Kelvin" <audictionary@onlineconnections.com.au>

=====
en_CA:

The dictionary file was created using the "final" English and Canadian SCOWL (Spell Checker Oriented Word Lists) wordlists available at Kevin's Word Lists Page (<http://wordlist.sourceforge.net>). Lists with the suffixes 10, 20, 35, 50, 65 and 65 were used. Lists with the suffixes 70, 80 and 95 were excluded. Copyright information for SCOWL and the wordlists used in creating it is reproduced below.

The affix file is identical to the MySpell English (United States) affix file. It is a heavily modified version of the original english.aff file which was released as part of Geoff Kuenning's Ispell and as such is covered by his BSD license.

COPYRIGHT, SOURCES, and CREDITS from SCOWL readme file:

The collective work is Copyright 2000 by Kevin Atkinson as well as any of the copyrights mentioned below:

Copyright 2000 by Kevin Atkinson

Permission to use, copy, modify, distribute and sell these word lists, the associated scripts, the output created from the scripts, and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appears in all copies and that both that copyright notice and this permission notice appear in supporting documentation. Kevin Atkinson makes no representations about the suitability of this array for any purpose. It is provided "as is" without express or implied warranty.

Alan Beale <biljir@pobox.com> also deserves special credit as he has, in addition to providing the 12Dicts package and being a major contributor to the ENABLE word list, given me an incredible amount of feedback and created a number of special lists (those found in the Supplement) in order to help improve the overall quality of SCOWL.

The 10 level includes the 1000 most common English words (according to the Moby (TM) Words II [MWords] package), a subset of the 1000 most common words on the Internet (again, according to Moby Words II), and frequently class 16 from Brian Kelk's "UK English Wordlist with Frequency Classification".

The MWords package was explicitly placed in the public domain:

The Moby lexicon project is complete and has been placed into the public domain. Use, sell, rework, excerpt and use in any way on any platform.

Placing this material on internal or public servers is also encouraged. The compiler is not aware of any export restrictions so freely distribute world-wide.

You can verify the public domain status by contacting

Grady Ward
3449 Martha Ct.
Arcata, CA 95521-4884

grady@netcom.com
grady@northcoast.com

The "UK English Wordlist With Frequency Classification" is also in the Public Domain:

Date: Sat, 08 Jul 2000 20:27:21 +0100
From: Brian Kelk <Brian.Kelk@cl.cam.ac.uk>

> I was wondering what the copyright status of your "UK English
> Wordlist With Frequency Classification" word list as it seems to
> be lacking any copyright notice.

There were many many sources in total, but any text marked
"copyright" was avoided. Locally-written documentation was one
source. An earlier version
of the list resided in a filespace called
PUBLIC on the University mainframe, because it was considered public
domain.

Date: Tue, 11 Jul 2000 19:31:34 +0100

> So are you saying your word list is also in the public domain?

That is the intention.

The 20 level includes frequency classes 7-15 from Brian's word list.

The 35 level includes frequency classes 2-6 and words appearing in at
least 11 of 12 dictionaries as indicated in the 12Dicts package. All
words from the 12Dicts package have had likely inflections added via
my inflection database.

The 12Dicts package and Supplement is in the Public Domain.

The WordNet database, which was used in the creation of the
Inflections database, is under the following copyright:

This software and database is being provided to you, the LICENSEE,
by Princeton University under the following license. By obtaining,
using and/or copying this software and database, you agree that you
have read, understood,
and will comply with these terms and
conditions.:

Permission to use, copy, modify and distribute this software and
database and its documentation for any purpose and without fee or
royalty is hereby granted, provided that you agree to comply with
the following copyright notice and statements, including the
disclaimer, and that the same appear on ALL copies of the software,
database and documentation, including modifications that you make
for internal use or for distribution.

WordNet 1.6 Copyright 1997 by Princeton University. All rights
reserved.

THIS SOFTWARE AND DATABASE IS PROVIDED "AS IS" AND PRINCETON

UNIVERSITY MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, PRINCETON UNIVERSITY MAKES NO REPRESENTATIONS OR WARRANTIES OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF THE LICENSED SOFTWARE, DATABASE OR DOCUMENTATION WILL NOT INFRINGE ANY THIRD PARTY PATENTS, COPYRIGHTS, TRADEMARKS OR OTHER RIGHTS.

The name of Princeton University or Princeton may not be used in advertising or publicity pertaining to distribution of the software and/or database. Title to copyright in this software, database and any associated documentation shall at all times remain with Princeton University and LICENSEE agrees to preserve same.

The 50 level includes Brian's frequency class 1, words words appearing in at least 5 of 12 of the dictionaries as indicated in the 12Dicts package, and uppercase words in at least 4 of the previous 12 dictionaries. A decent number of proper names is also included: The top 1000 male, female, and Last names from the 1990 Census report; a list of names sent to me by Alan Beale; and a few names that I added myself. Finally a small list of abbreviations not commonly found in other word lists is included.

The name files from the Census report is a government document which I don't think can be copyrighted.

The name list from Alan Beale is also derived from the linux words list, which is derived from the DEC list. He also added a bunch of miscellaneous names to the list, which he released to the Public Domain.

The DEC Word list doesn't have a formal name. It is labeled as "FILE: english.words; VERSION: DEC-SRC-92-04-05" and was put together by Jorge Stolfi <stolfi@src.dec.com> DEC Systems Research Center. The DEC Word list has the following copyright statement:

(NON-)COPYRIGHT STATUS

To the best of my knowledge, all the files I used to build these wordlists were available for public distribution and use, at least for non-commercial purposes. I have confirmed this assumption with the authors of the lists, whenever they were known.

Therefore, it is safe to assume that the wordlists in this package can also be freely copied, distributed, modified, and used for personal, educational, and research purposes. (Use of these files in commercial products may require written permission from DEC and/or the authors of the original lists.)

Whenever you distribute any of these wordlists, please distribute also the accompanying README file. If you distribute a modified copy of one of these wordlists, please include the original README file with a note explaining your modifications. Your users will surely appreciate that.

(NO-)WARRANTY DISCLAIMER

These files, like the original wordlists on which they are based, are still very incomplete, uneven, and inconsistent, and probably contain many errors. They are offered "as is" without any warranty of correctness or fitness for any particular purpose. Neither I nor my employer can be held responsible for any losses or damages that may result from their use.

However since this Word List is used in the linux.words package which the author claims is free of any copyright I assume it is OK to use for most purposes. If you want to use this in a commercial project and this concerns you the information from the DEC word list can easily be removed without much sacrifice in quality as only the name lists were used.

The file special-jargon.50 uses common.lst and word.lst from the "Unofficial Jargon File Word Lists" which is derived from "The Jargon File". All of which is in the Public Domain. This file also contain a few extra UNIX terms which are found in the file "unix-terms" in the special/ directory.

The 60 level includes Brian's frequency class 0 and all words appearing in at least 2 of the 12 dictionaries as indicated by the 12Dicts package. A large number of names are also included: The 4,946 female names and 3,897 male names from the MWords package and the files "computer.names", "misc.names", and "org.names" from the DEC package.

The 65 level includes words found in the Ispell "medium" word list. The Ispell word lists are under the same copyright of Ispell itself which is:

Copyright 1993, Geoff Kuenning, Granada Hills, CA
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All modifications to the source code must be clearly marked as such. Binary redistributions based on modified source code must be clearly marked as modified versions in the documentation and/or other materials provided with the distribution.
4. All advertising materials mentioning features or use of this software must display the following acknowledgment:
This product
includes software developed by Geoff Kuenning and
other unpaid contributors.
5. The name of Geoff Kuenning may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY GEOFF KUENNING AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL GEOFF KUENNING OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The 70 level includes the 74,550 common dictionary words and the 21,986 names list from the MWords package. The common dictionary words, like those from the 12Dicts package, have had all likely inflections added.

The 80 level includes the ENABLE word list, all the lists in the ENABLE supplement package (except for ABLE), the "UK Advanced Cryptics Dictionary" (UKACD), the list of signature words in from YAWL package, and the 10,196 places list from the MWords package.

The ENABLE package, mainted by M\Cooper <thegrendel@theriver.com>, is in the Public Domain:

The ENABLE master word list, WORD.LST, is herewith formally released into the Public Domain. Anyone is free to use it or distribute it in any manner they see fit. No fee or registration is required for its use nor are "contributions" solicited (if you feel you absolutely must contribute something for your own peace of mind, the authors of

the ENABLE list ask that you make a donation on their behalf to your favorite charity). This word list is our gift to the Scrabble community, as an alternate to "official" word lists. Game designers may feel free to incorporate the WORD.LST into their games. Please mention the source and credit us as originators of the list. Note that if you, as a game designer, use the WORD.LST in your product, you may still copyright and protect your product, but you may *not* legally copyright or in any way restrict redistribution of the WORD.LST portion of your product. This *may* under law restrict your rights to restrict your users' rights, but that is only fair.

UKACD, by J Ross Beresford <ross@bryson.demon.co.uk>, is under the following copyright:

Copyright (c) J Ross Beresford 1993-1999. All Rights Reserved.

The following restriction is placed on the use of this publication: if The UK Advanced Cryptics Dictionary is used in a software package or redistributed in any form, the copyright notice must be prominently displayed and the text of this document must be included verbatim.

There are no other restrictions: I would like to see the list distributed as widely as possible.

The 95 level includes the 354,984 single words and 256,772 compound words from the MWords package, ABLE.LST from the ENABLE Supplement, and some additional words found in my part-of-speech database that were not found anywhere else.

Accent information was taken from UKACD.

My VARCON package was used to create the American, British, and Canadian word list.

Since the original word lists used used in the VARCON package came from the Ispell distribution they are under the Ispell copyright.

The variant word lists were created from a list of variants found in the 12dicts supplement package as well as a list of variants I created myself.

=====
en_GB:

This dictionary was initially based on a subset of the

original English wordlist created by Kevin Atkinson for Pspell and Aspell and thus is covered by his original LGPL licence.

It has been extensively updated by David Bartlett, Brian Kelk and Andrew Brown:

- numerous Americanism have been removed
- numerous American spellings have been corrected
- missing words have been added
- many errors have been corrected
- compound hyphenated words have been added where appropriate

Valuable inputs to this process were received from many other people - far too numerous to name. Serious thanks to you all for your greatly appreciated help.

This word list is intended to be a good representation of current modern British English and thus it should be a good basis for Commonwealth English in most countries of the world outside North America.

The affix file has been created completely from scratch by David Bartlett and Andrew Brown, based on the published rules for MySpell and is also provided under the LGPL.

In creating the affix rules an attempt has been made to reproduce the most general rules for English word formation, rather than merely use it as a means to compress the size of the dictionary. It is hoped that this will facilitate future localisation to other variants of English.

Please let David Bartlett <dwb@openoffice.org> know of any errors that you find.

The current release is R 1.18, 11/04/05
=====

en_NZ:

- I. Copyright
 - II. Copying (Licence)
-

I. Copyright

NZ English Dictionary v0.9 beta - Build 06SEP03

~~~~~  
NB This is an initial version, please check:

[http://lingucomponent.openoffice.org/download\\_dictionary.html](http://lingucomponent.openoffice.org/download_dictionary.html)

or

<http://www.girlza.com/dictionary/download.html>

for a final version, after a little while (no hurry).

This dictionary is based on the en\_GB Myspell dictionary which in turn was initially based on a subset of the original

English wordlist created by Kevin Atkinson for Pspell and Aspell and thus is covered by his original LGPL licence.

#### Introduction

~~~~~  
en_NZ.dic has been altered to include New Zealand places, including major cities and towns, and major suburbs. It also contains NZ words, organisations and expressions.

en_NZ.aff has had a few REPlace strings added, but is basically unchanged.

Acknowledgements

~~~~~  
Thanks must go to the original creators of the British dictionary, David Bartlett, Brian Kelk and Andrew Brown.

I wouldn't have started this without seeing the Australian dictionary, thanks Kelvin Eldridge, Jean Hollis Weber and David Wilson.

And thank you to all who've contributed to OpenOffice.org.

#### License

~~~~~  
This dictionary is covered by the GNU Lesser General Public License, viewable at <http://www.gnu.org/copyleft/lesser.html>

Issues

~~~~~  
Many of the proper nouns already in the dictionary do not have

an affix for 's.

All

my new words start after the z's of the original dictionary.

Contact

~~~~~

Contact Tristan Burtenshaw (hooty@slingshot.co.nz) with any words, places or other suggestions for the dictionary.

II. Copying

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs

(which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify

that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object

file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more

than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses

terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER

PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

uganda.txt For Vim version 7.2. Last change: 2008 Jun 21

VIM REFERENCE MANUAL by Bram Moolenaar

uganda *Uganda* *copying* *copyright* *license*
SUMMARY

iccf *ICCF*

Vim is Charityware. You can use and copy it as much as you like, but you are encouraged to make a donation for needy children in Uganda. Please see |kcc| below or visit the ICCF web site, available at these URLs:

<http://iccf-holland.org/>

<http://www.vim.org/iccf/>

<http://www.iccf.nl/>

You can also sponsor the development of Vim. Vim sponsors can vote for features. See |sponsor|. The money goes to Uganda anyway.

The Open Publication License applies to the Vim documentation, see |manual-copyright|.

=== begin of license ===

VIM LICENSE

D) There are no restrictions on distributing unmodified copies of Vim except that they must include this license text. You can also distribute unmodified parts of Vim, likewise unrestricted except that they must

include this license text. You are also allowed to include executables that you made from the unmodified Vim sources, plus your own usage

examples and Vim scripts.

II) It is allowed to distribute a modified (or extended) version of Vim, including executables and/or source code, when the following four conditions are met:

- 1) This license text must be included unmodified.
- 2) The modified Vim must be distributed in one of the following five ways:
 - a) If you make changes to Vim yourself, you must clearly describe in the distribution how to contact you. When the maintainer asks you (in any way) for a copy of the modified Vim you distributed, you must make your changes, including source code, available to the maintainer without fee. The maintainer reserves the right to include your changes in the official version of Vim. What the maintainer will do with your changes and under what license they will be distributed is negotiable.

If there has been no negotiation

then this license, or a later version, also applies to your changes.

The current maintainer is Bram Moolenaar <Bram@vim.org>. If this changes it will be announced in appropriate places (most likely vim.sf.net, www.vim.org and/or comp.editors). When it is completely impossible to contact the maintainer, the obligation to send him your changes ceases. Once the maintainer has confirmed that he has received your changes they will not have to be sent again.

- b) If you have received a modified Vim that was distributed as mentioned under a) you are allowed to further distribute it unmodified, as mentioned at I). If you make additional changes the text under a) applies to those changes.
 - c) Provide all the changes, including source code, with every copy of the modified Vim you distribute. This may be done in the form of a context diff. You can choose what license to use for new code you

add. The changes and their license must not restrict others from making their own changes to the official version of Vim.

- d) When you have a modified Vim which includes changes as mentioned under c), you can distribute it without the source code for the changes if the following three conditions are met:

- The license that applies to the changes permits you to distribute the changes to the Vim maintainer without fee or restriction, and permits the Vim maintainer to include the changes in the official version of Vim without fee or restriction.
- You keep the changes for at least three years after last distributing the corresponding modified Vim. When the maintainer or someone who you distributed the modified Vim to asks you (in any way) for the changes within this period, you must make them available to him.
- You clearly describe in the distribution how to contact you. This contact information must

remain valid for at least three years

after last distributing the corresponding modified Vim, or as long as possible.

e) When the GNU General Public License (GPL) applies to the changes, you can distribute the modified Vim under the GNU GPL version 2 or any later version.

3) A message must be added, at least in the output of the ":version" command and in the intro screen, such that the user of the modified Vim is able to see that it was modified. When distributing as mentioned under 2)e) adding the message is only required for as far as this does not conflict with the license used for the changes.

4) The contact information as required under 2)a) and 2)d) must not be removed or changed, except that the person himself can make corrections.

III) If you distribute a modified version of Vim, you are encouraged to use the Vim license for your changes and make them available to the maintainer,

including the source code. The preferred way to do this is

by e-mail or by uploading the files to a server and e-mailing the URL.

If the number of changes is small (e.g., a modified Makefile) e-mailing a context diff will do. The e-mail address to be used is

<maintainer@vim.org>

IV) It is not allowed to remove this license from the distribution of the Vim sources, parts of it or from a modified version. You may use this license for previous Vim releases instead of the license that they came with, at your option.

=== end of license ===

Note:

- If you are happy with Vim, please express that by reading the rest of this file and consider helping needy children in Uganda.

- If you want to support further Vim development consider becoming a [sponsor]. The money goes to Uganda anyway.

- According to Richard Stallman the Vim license is GNU GPL compatible. A few minor changes have been made since he checked it, but that should not make a difference.

- If you link Vim with a library that goes under the GNU GPL, this limits further distribution to the GNU GPL. Also when you didn't actually change anything in Vim.

- Once a change is included that goes under the GNU GPL, this forces all further changes to also be made under the GNU GPL or a compatible license.

- If you distribute a modified version of Vim, you can include your name and contact information with the "--with-modified-by" configure argument or the MODIFIED_BY define.

=====
Kibaale Children's Centre *kcc* *Kibaale* *charity*

Kibaale Children's Centre (KCC) is located in Kibaale, a small town in the south of Uganda, near Tanzania, in East Africa. The area is known as Rakai District. The population is mostly farmers. Although people are poor, there is enough food. But this district is suffering from AIDS more than any other part

of the world. Some say that it started there. Estimations are that 10 to 30% of the Ugandans are infected with HIV. Because parents die, there are many orphans. In this district about 60,000 children have lost one or both parents, out of a population of 350,000. And this is still continuing.

The children need a lot of help. The KCC is working hard to provide the needy with food, medical care and education. Food and medical care to keep them healthy now, and education so that they can take care of themselves in the future. KCC works on a Christian base, but help is given to children of any religion.

The key to solving the problems in this area is education. This has been neglected in the past years with president Idi Amin and the following civil wars. Now that the government is stable again, the children and parents have to learn how to take care of themselves and how to avoid infections. There is also help for people who are ill and hungry, but the primary goal is to prevent people from getting ill and to teach them how to grow healthy food.

Most of the orphans are living in an extended family. An uncle or older sister is taking care of them. Because these families are big and the income (if any) is low, a child is lucky if it gets healthy food. Clothes, medical care and schooling is beyond its reach. To help these needy children, a sponsorship program was put into place. A child can be financially adopted. For a few dollars a month KCC sees to it that the child gets indispensable items, is healthy, goes to school and KCC takes care of anything else that needs to be done for the child and the family that supports it.

Besides helping the child directly, the environment where the child grows up needs to be improved. KCC helps schools to improve their teaching methods. There is a demonstration school at the centre and teacher trainings are given. Health workers are being trained, hygiene education is carried out and households

are stimulated to build a proper latrine. I helped setting up a production site for cement slabs. These are used to build a good latrine. They are sold below cost price.

There is a small clinic at the project, which provides children and their family with medical help. When needed, transport to a hospital is offered. Immunization programs are carried out and help is provided when an epidemic is breaking out (measles and cholera have been a problem).

donate

Summer 1994 to summer 1995 I spent a whole year at the centre, working as a volunteer. I have helped to expand the centre and worked in the area of water and sanitation. I learned that the help that the KCC provides really helps. When I came back to Holland, I wanted to continue supporting KCC. To do this I'm raising funds and organizing the sponsorship program. Please consider one of these possibilities:

1. Sponsor a child in primary school: 17 euro a month (or more).
2. Sponsor a child
in secondary school: 25 euro a month (or more).
3. Sponsor the clinic: Any amount a month or quarter
4. A one-time donation

Compared with other organizations that do child sponsorship the amounts are very low. This is because the money goes directly to the centre. Less than 5% is used for administration. This is possible because this is a small organization that works with volunteers. If you would like to sponsor a child, you should have the intention to do this for at least one year.

How do you know that the money will be spent right? First of all you have my personal guarantee as the author of Vim. I trust the people that are working at the centre, I know them personally. Further more, the centre is co-sponsored and inspected by World Vision, Save the Children Fund and International Child Care Fund. The centre is visited about once a year to check the progress (at our own cost). I have visited the centre myself in 1996, 1998, 2000, 2001 and 2003. The visit reports are on the ICCF web site.

If you have any further questions, send me e-mail: <Bram@vim.org>.

The address of the centre is:

Kibaale Children's Centre
p.o. box 1658
Masaka, Uganda, East Africa

Sending money: *iccf-donations*

Check the ICCF web site for the latest information! See [iccf] for the URL.

USA: The methods mentioned below can be used.

Sending a check to the Nehemiah Group Outreach Society (NGOS) is no longer possible, unfortunately. We are looking for another way to get you an IRS tax receipt.

For sponsoring a child contact KCF in Canada (see below). US checks can be sent to them to lower banking costs.

Canada: Contact Kibaale Children's Fund (KCF) in Surrey, Canada. They take care of the Canadian sponsors for the children in Kibaale. KCF forwards 100% of the money to the project in Uganda. You can send them a one time donation directly. Please send me a note so that I know what has been donated because

of Vim. Ask KCF for information about sponsorship.

Kibaale Children's Fund c/o Pacific Academy

10238-168 Street

Surrey, B.C. V4N 1Z4

Canada

Phone: 604-581-5353

If you make a donation to Kibaale Children's Fund (KCF) you will receive a tax receipt which can be submitted with your tax return.

Holland: Transfer to the account of "Stichting ICCF Holland" in Venlo.

This will allow for tax deduction if you live in Holland.

Postbank, nr. 4548774

Germany: It is possible to make donations that allow for a tax return.

Check the ICCF web site for the latest information:

<http://iccf-holland.org/germany.html>

World: Use a postal money order. That should be possible from any country, mostly from the post office. Use this name (which is in my passport): "Abraham Moolenaar". Use Euro for the currency if possible.

Europe: Use a bank transfer if possible. Your bank should have a form that you can use for this. See "Others"

below for the swift

code and IBAN number.

Any other method should work. Ask for information about sponsorship.

Credit Card: You can use PayPal to send money with a Credit card. This is the most widely used Internet based payment system. It's really simple to use. Use this link to find more info:

https://www.paypal.com/en_US/mrb/pal=XAC62PML3GF8Q

The e-mail address for sending the money to is:

Bram@iccf-holland.org

For amounts above 400 Euro (\$500) sending a check is preferred.

Others: Transfer to one of these accounts if possible:

Postbank, account 4548774

Swift code: INGB NL 2A

IBAN: NL47 PSTB 0004 5487 74

under the name "stichting ICCF Holland", Venlo

If that doesn't work:

Rabobank Venlo, account 3765.05.117

Swift code: RABO NL 2U

under the name "Bram Moolenaar", Venlo

Otherwise, send a check in euro or US dollars to the address below. Minimal amount: \$70 (my bank does not accept smaller

amounts for foreign check, sorry)

Address to send checks to:

stichting ICCF Holland

Bram Moolenaar

Finsterruetihof 1

8134 Adliswil

Switzerland

This address is expected to be valid for a long time.

vim:tw=78:ts=8:ft=help:norl:

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below,

refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but

does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for

making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License.

If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of

this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright"

line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If

the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type 'show w'.
This is free software, and you are welcome to redistribute it under certain conditions; type 'show c' for details.

The hypothetical commands 'show w' and 'show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than 'show w' and 'show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program 'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may

consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

=====
Visual Studio - Vim Integration
=====

Copyright (C) 1997 Heiko Erhardt

VisVim is a Visual Studio Add-In that allows Vim to be integrated as the default text editor. It will be used instead of the Visual Studio built-in editor when you double-click on a file or press F4 after compiling (it will go to the proper line in the Vim buffer). The file can be loaded exclusively by Vim or additionally to the builtin Visual Studio editor (this option can be set in the VisVim configuration dialog inside Visual Studio). Vim does not replace the Visual Studio editor, it still runs in its own window.

VisVim is based upon VisEmacs by Christopher Payne
(Copyright (C) Christopher Payne 1997).

Author: Heiko Erhardt <Heiko.Erhardt@munich.netsurf.de>
Based upon: VisEmacs by Christopher Payne <payneca@sagian.com>
Version: 1.0
Created: 23 Oct 1997
Date: 23 Oct 1997

VisVim is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version.

VisVim is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

Requirements

VisVim works with the *OLE-enabled* version of Vim version 5.0 and higher only!!! You must download the extra archive containing the OLE-enabled executable from your Vim download site. When building your own Vim executable, use the if_ole_vc.mak makefile (Vim 5.1 and higher).

VisVim needs DevStudio 5.0 or higher. It does not work with DevStudio 4.2.

Installation

- 1) Close running instances of DevStudio.
- 2) Copy VisVim.dll into a convenient directory like \vim, \vim\lib, or \vim\addin
- 3) Register the DLL using regsvr32.exe ...
(Skip this on Windows 95/98)
Example:
> cd \vim\addin
> regsvr32 VisVim.dll
On NT, you should do this from an administrator account.
Before installing a new version of VisVim you should unregister the old one using
> regsvr32 -unregister VisVim.dll
The batch files register.bat and unregister.bat can do that for you.
- 3a) If you didn't do this yet: Register the OLE gvim:
> gvim -register
- 4) Start Visual Studio and go to:
Tools
Customize...
Add-Ins and Macro Files
- 5) Click on Browse, and point Visual Studio to your VisVim.dll file.
- 6) Click the checkbox to indicate that you want to use the Add-In, and Close the Customize dialog box.
- 7) You should notice the VisVim Toolbar with the Vim Icon.
Click the first item of the toolbar to get to the options dialog.

Compiling VisVim

Two Options:

- 1) Load the VisVim.mak file as a Workspace in Visual Studio and compile
- 2) Use the MSVC command line
compiler:
vcvars32

nmake -f VisVim.mak

Using VisVim

The VisVim DLL exposes several functions to the user. These functions are accessible using the toolbar or by assigning hotkeys to them (see below).

The following functions are visible on the toolbar (from left to right):

1. VisVim settings dialog

The settings you adjust here will be saved in the registry and will be reloaded on program startup.

2. Enable Vim

Enables Vim as Visual Studio editor. Control will be switched to Vim when:

- Clicking a file in the file view
- Clicking a compiler error message line
- Using the 'File-Open' Dialog
- Showing the current source line when encountering a debugger breakpoint.
- Using File-New

3. Disable Vim

The internal Visual Studio editor will be used to edit files.

4. Toggle enable state

Toggles the enable state of VisVim. Use this function if you want to have one button only to activate/deactivate Vim.

5. Load

current file in Vim

Loads the file shown in the internal editor into Vim. Use this function if you want the internal editor to stay active and just edit one file in Vim.

This command works always whether Vim is enabled as default editor or not.

You cannot use DevStudio's debugger commands from inside Vim, so you should disable Vim before running the debugger.

You can customize the Vim toolbar itself or add the Vim buttons to other toolbars.

To have fast access to the VisVim options dialog I suggest to create keyboard shortcuts:

1) Choose

Tools

Customize...

Keyboard

2) Choose Category: AddIns and Commands: VisVim.

3) Choose 'Main' as editor, enter each hotkey and press the Assign button.

I suggest:

VisVimDialogCmd Alt+Shift+V

VisVimEnableCmd Alt+Shift+E

VisVimDisableCmd Alt+Shift+D

VisVimToggleCmd Alt+Shift+T

VisVimLoadCmd Alt+Shift+G

4) Close the dialog

Now a typical debugging example:

Using

"Alt+Shift+d" you turn off Vim before starting the debugger.

After hitting the breakpoint you single step through your application using the internal source code editor and examine variables.

When you stumble across the line with the null pointer assignment, just press "Alt+Shift+g", and correct the error in Vim.

Save the file, press Alt+Tab to return to DevStudio and press F7 to compile.

That's it.

Troubleshooting

1. When opening a file in DevStudio the file is opened in the DevStudio editor and immediately vanishes. No Vim shows up.

Cause: Probably you don't have the OLE-enabled Vim or you didn't register it.

Explanation: VisVim is notified by DevStudio if an 'open document' event occurs. It then closes the document in the internal editor and tries to start Vim. If Vim isn't properly OLE-registered, this won't work.

Workaround: Download and install the OLE-enable version of Vim and execute "gvim -register".

2.

Sometimes when clicking on a file, the file won't be opened by Vim but instead the Visual Studio editor comes up.

Cause: The file was already loaded by the DevStudio editor.

Explanation: VisVim works by hooks exposed by Visual Studio.

Most of the functionality works from the OpenDocument hook.

If a document is already loaded in the Visual Studio editor, no 'open document' event will be generated when clicking the file in the file list.

Workaround: Close the document in Visual Studio first.

3. I can't get VisVim to work. Either the Vim toolbar does not appear at all or weird crashes happen.

Cause: The Visual Studio installation is messed up.

Explanation: I can't give you one. Ask M\$.

Workaround: Reinstall DevStudio (I know this is brute, but in some cases it helped). There was one case where the service pack 1 had to be installed, too.

4. If an instance of Vim is already running, VisVim will use that instance and not start a new one.

Cause: This is proper OLE behaviour

Explanation: Some call it a bug, some a feature. That's just the way OLE works.

5. When being in insert mode in Vim and selecting a file in Visual Studio, the Vim command :e ... is inserted as text instead of being executed.

Cause: You probably know...

Explanation: The Vim OLE automation interface interprets the VisVim commands as if they were typed in by the user.

So if you're in insert mode Vim considers it to be text.

I decided against sending an ESC before the command because it may cause a beep or at least a screen flash when noeb is set.

Workaround: Get used to press ESC before switching to DevStudio.

6. I'm tired of VisVim but I can't get rid of it. I can't delete it in Tools-Customize-Add-Ins.

Cause: You can't delete an item you once added to the add-ins list box.

Explanation: M\$ just didn't put a 'delete' button in the dialog box.

Unfortunately there is no DEL key accellerator as well...

Workaround: You can't kill it, but you can knock it out:

1. Uncheck the check box in front of 'Vim Developer Studio Add-in'.
2. Close Visual Studio.
3. Delete VisVim.dll or move it somewhere it can't be found.
4. Run Visual Studio.
5. Tools -> Cursomize ->Add-ins and Macro-Files.
6. A message appears:

"../VisVim.dll" "This add-in no longer exists. It will no longer be displayed."

That's it!

Change history

1.0a to 1.0

- All settings in the VisVim dialog are remembered between DevStudio sessions by keeping them in the registry (HKEY_CURRENT_USER\Software\Vim\VisVim).
- Added an option to do a :cd before opening the file (having a file opened by clicking it but finding out to be still in C:\Windows\system when trying to open another file by ":e" can be annoying). Change directory can be done to the source file's directory or it's parent directory.
- Added some explanations to the error message for the CO_E_CLASSSTRING error ("Use OLE Vim and make sure to register...").

1.0 to 1.1a

- The VisVim toolbar button now shows the new Vim icon instead of the old one.
- Made some changes to the documentation, added the troubleshooting chapter and ToDo list.
- File-New-* now invokes Vim instead of the builtin editor if enabled.

1.1 to 1.1b

- Extended the VisVim toolbar to have multiple buttons instead of one.
- Moved the enable/disable commands from the settings dialog to the toolbar.
- Added the toggle enable/disable command
- Added the 'load current file' command.

1.1b to 1.2

No new features, just some fine tuning:

- Changed the GUID of the VisVim OLE interface to avoid conflicts with a version of VisEmacs or VisVile on the same computer (Guy Gascoigne)
- Fixed a bug caused by a bug in the Developer Studio add-in code generator (Clark Morgan)
- Fixed a memory leak (Clark Morgan)
- Added an option in the VisVim dialog to prepend ESC before the first command that is sent to Vim. This will avoid inserting the command as text when Vim is still in insert mode.
- An :update command is sent to Vim before any other command to update the current file if it is modified, or else the following :cd or :e command will fail.

1.2 to 1.3a

- Fixed a bug caused by a missing EnableModeless() function call in VimLoad().

This seems to reduce VisVim crashing DevStudio on some systems (it occasionally still seems to happen, but it's more stable now).

(Vince Negri)

- Added support for the new CTRL-\ CTRL-N command of Vim 5.4a.

This prevents Vim from beeping when a VisVim command is executed and Vim is not in insert mode.

ToDo List

P1 is highest priority, P10 lowest

P9 Switching to DevStudio using ALT-TAB may get annoying. Would be nice to have the option to map `ActivateApplication("Visual Studio")` in Vim.

Vim DLLs would solve that problem.

P8 Execute `:tag` command in Vim for word under cursor in DevStudio

P7 Controlling the Visual Studio Debugger from inside Vim

See message above. Also a 'Debug' highlight group and a command to highlight a certain line would be necessary.

P6 Provide an option to open the current file in VisVim in Visual Studio editor

Same as above message. A kind of two way OLE automation would have to be established between VisVim and Vim. Also a 'Debug' highlight group and a command to highlight a certain line would be necessary.

Known Problems

- Occasional memory corruptions in DevStudio may appear on some systems.

Reinstalling DevStudio helped in some cases.

The cause of these crashes is unclear; there is no way to debug this.

Recompiling VisVim with DevStudio SP3 didn't help.

I assume it's a problem deep inside the DevStudio add-in OLE interfaces.

This will hopefully be fixed with DevStudio 6.

Have fun!

Heiko Erhardt

Heiko.Erhardt@munich.netsurf.de

1.83 libice 1.0.6-1.el6

1.83.1 Available under license :

/*

* Copyright 2003 Keith Packard

*

* Permission to use, copy, modify, distribute, and sell this software and its
* documentation for any purpose is hereby granted without fee, provided that
* the above copyright notice appear in all copies and that both that
* copyright notice and this permission notice appear in supporting
* documentation, and that the name of Keith Packard not be used in
* advertising or publicity pertaining to distribution of the software without
* specific, written prior permission. Keith Packard makes no
* representations about the suitability of this software for any purpose. It
* is provided "as is" without express or implied warranty.

*

* KEITH PACKARD DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE,
* INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO
* EVENT SHALL KEITH PACKARD BE LIABLE FOR ANY SPECIAL, INDIRECT OR
* CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE,
* DATA
OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER
* TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR
* PERFORMANCE OF THIS SOFTWARE.

*/

Copyright 1993, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its
documentation for any purpose is hereby granted without fee, provided that
the above copyright notice appear in all copies and that both that
copyright notice and this permission notice appear in supporting
documentation.

The above copyright notice and this permission notice shall be included in
all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE
OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN
AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN
CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not
be
used in advertising or otherwise to promote the sale, use or other dealings

in this Software without prior written authorization from The Open Group.

Author: Ralph Mor, X Consortium

Copyright (C) 1996, 1997, 1998, 1999, 2000, 2001, 2003, 2004, 2005, 2006, 2007 2008 Free Software Foundation, Inc.

This is free software; see the source for copying conditions. There is NO

warranty; not even for MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

GNU Libtool is free software; you can redistribute it and/or modify

it under the terms of the GNU General Public License as published by

the Free Software Foundation; either version 2 of the License, or

(at your option) any later version.

#

As a special exception to the GNU General Public License,

if you distribute this file as part of a program or library that

is built using GNU Libtool, you may include this file under the

same distribution terms that you use for the rest of that program.

#

GNU Libtool is distributed in the hope that it will be useful, but

WITHOUT ANY WARRANTY; without even the implied warranty of

MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU

#

General Public License for more details.

#

You should have received a copy of the GNU General Public License

along with GNU Libtool; see the file COPYING. If not, a copy

can be downloaded from <http://www.gnu.org/licenses/gpl.html>,

or obtained by writing to the Free Software Foundation, Inc.,

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.

This originates from X11R5 (mit/util/scripts/install.sh), which was

later released in X11R6 (xc/config/util/install.sh) with the

following copyright and license.

#

Copyright (C) 1994 X Consortium

#

Permission is hereby granted, free of charge, to any person obtaining a copy

of this software and associated documentation files (the "Software"), to

deal in the Software without restriction, including without limitation the

rights to use, copy, modify, merge, publish, distribute, sublicense, and/or

sell copies of the Software, and to permit persons to whom the Software is

furnished to do so, subject to the following conditions:

#

The above copyright notice and this permission notice shall be included in

all copies or substantial portions of the Software.

#

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,

FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT.

```
IN NO EVENT SHALL THE
# X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN
# AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNec-
# TION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.
#
# Except as contained in this notice, the name of the X Consortium shall not
# be used in advertising or otherwise to promote the sale, use or other deal-
# ings in this Software without prior written authorization from the X Consor-
# tium.
#
#
# FSF changes to this file are in the public domain.
#
# Calling this script install-sh is preferred over install.sh, to prevent
# `make' implicit rules from creating a file called install from it
# when there is no Makefile.
#
# This script is compatible with the BSD install script, but was written
# from scratch.
```

1.84 cairo 1.8.8-3.1.el6

1.84.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who
decide to use it. You
can use it too, but we suggest you first think carefully about whether

this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and

is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library.

The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a

fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under

any particular circumstance,
the balance of the section is intended to
apply, and the section as a whole is intended to apply in other
circumstances.

It is not the purpose of this section to induce you to infringe any
patents or other property right claims or to contest validity of any
such claims; this section has the sole purpose of protecting the
integrity of the free software distribution system which is
implemented by public license practices. Many people have made
generous contributions to the wide range of software distributed
through that system in reliance on consistent application of that
system; it is up to the author/donor to decide if he or she is willing
to distribute software through any other system and a licensee cannot
impose that choice.

This section is intended to make thoroughly clear what is believed to
be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in
certain countries either by patents or by copyrighted
interfaces, the
original copyright holder who places the Library under this License
may add an explicit geographical distribution limitation excluding those
countries, so that distribution is permitted only in or among
countries not thus excluded. In such case, this License incorporates
the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new
versions of the Lesser General Public License from time to time.
Such new versions will be similar in spirit to the present version,
but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library
specifies a version number of this License which applies to it and
"any later version", you have the option of following the terms and
conditions either of that version or of any later version published by
the Free Software Foundation. If the Library does not specify a
license version number, you
may choose any version ever published by
the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free
programs whose distribution conditions are incompatible with these,
write to the author to ask for permission. For software which is
copyrighted by the Free Software Foundation, write to the Free
Software Foundation; we sometimes make exceptions for this. Our
decision will be guided by the two goals of preserving the free status

of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library 'Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there
is to it!
Cairo is free software.

Every source file in the implementation[*] of cairo is available to be redistributed and/or modified under the terms of either the GNU Lesser General Public License (LGPL) version 2.1 or the Mozilla Public License (MPL) version 1.1. Some files are available under more liberal terms, but we believe that in all cases, each file may be used under either the LGPL or the MPL.

See the following files in this directory for the precise terms and conditions of either license:

COPYING-LGPL-2.1
COPYING-MPL-1.1

Please see each file in the implementation for copyright and licensing information, (in the opening comment of each file).

[*] The implementation of cairo is contained entirely within the "src"

and "pixman" directories of the cairo source distribution. There are other components of the cairo source distribution (such as the "test" and "perf") that are auxiliary to the library itself. None of the source code in these directories contributes to a build of the cairo library itself, (libcairo.so or cairo.dll or similar).

These auxiliary components are also free software, but may be under different license terms than cairo itself. For example, most of the test cases in the perf and test directories are made available under an MIT license to simplify any use of this code for reference purposes in using cairo itself. Other files might be available under the GNU General Public License (GPL), for example. Again, please see the opening comment of each file for copyright and licensing information.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether

gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's

source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to

exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any

such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time.

Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and  
a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version 2 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type 'show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type 'show c' for details.
```

The hypothetical commands 'show w' and 'show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than 'show w' and 'show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public

License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

MOZILLA PUBLIC LICENSE

Version 1.1

1. Definitions.

1.0.1. "Commercial Use" means distribution or otherwise making the Covered Code available to a third party.

1.1. "Contributor" means each entity that creates or contributes to the creation of Modifications.

1.2. "Contributor Version" means the combination of the Original Code, prior Modifications used by a Contributor, and the Modifications made by that particular Contributor.

1.3. "Covered Code" means the Original Code or Modifications or the combination of the Original Code and Modifications, in each case including portions thereof.

1.4. "Electronic Distribution Mechanism" means a mechanism generally accepted in the software development community for the electronic transfer of data.

1.5. "Executable" means Covered Code in any form other than Source Code.

1.6. "Initial Developer" means the individual or entity identified as the Initial Developer in the Source Code notice required by Exhibit A.

1.7. "Larger Work" means a work which combines Covered Code or portions thereof with code not governed by the terms of this License.

1.8. "License" means this document.

1.8.1. "Licensable" means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently acquired, any and all of the rights conveyed herein.

1.9. "Modifications" means any addition to or deletion from the substance or structure of either the Original Code or any previous Modifications. When Covered Code is released as a series of files, a Modification is:

A. Any addition to or deletion from the contents of a file containing Original Code or previous Modifications.

B. Any new file that contains any part of the Original Code or previous Modifications.

1.10. "Original Code" means Source Code of computer software code which is described in the Source Code notice required by Exhibit A as Original Code, and which, at the time of its release under this License is not already Covered Code governed by this License.

1.10.1. "Patent Claims" means any patent claim(s), now owned or hereafter acquired, including without limitation, method, process, and apparatus claims, in any patent Licensable by grantor.

1.11. "Source Code" means the preferred form of the Covered Code for making modifications to it, including all modules it contains, plus any associated interface definition files, scripts used to control compilation and installation of an Executable, or source code differential comparisons against either the Original Code or another well known, available Covered Code of the Contributor's choice. The Source Code can be in a compressed or archival form, provided the appropriate decompression or de-archiving software is widely available for no charge.

1.12. "You" (or "Your") means an individual or a legal entity exercising rights under, and complying with all of the terms of, this License or a future version of this License issued under Section 6.1. For legal entities, "You" includes any entity which controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. Source Code License.

2.1. The Initial Developer Grant.

The Initial Developer hereby grants You a world-wide, royalty-free, non-exclusive

license, subject to third party intellectual property claims:

(a) under intellectual property rights (other than patent or trademark) Licensable by Initial Developer to use, reproduce, modify, display, perform, sublicense and distribute the Original Code (or portions thereof) with or without Modifications, and/or as part of a Larger Work; and

(b) under Patents Claims infringed by the making, using or selling of Original Code, to make, have made, use, practice, sell, and offer for sale, and/or otherwise dispose of the Original Code (or portions thereof).

(c) the licenses granted in this Section 2.1(a) and (b) are effective on the date Initial Developer first distributes Original Code under the terms of this License.

(d) Notwithstanding Section 2.1(b) above, no patent license is granted: 1) for code that You delete from the Original Code; 2) separate from the Original Code; or 3) for infringements caused by: i) the modification of the Original Code or ii) the

combination of the Original Code with other software or devices.

2.2. Contributor Grant.

Subject to third party intellectual property claims, each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license

(a) under intellectual property rights (other than patent or trademark) Licensable by Contributor, to use, reproduce, modify, display, perform, sublicense and distribute the Modifications created by such Contributor (or portions thereof) either on an unmodified basis, with other Modifications, as Covered Code and/or as part of a Larger Work; and

(b) under Patent Claims infringed by the making, using, or selling of Modifications made by that Contributor either alone and/or

in combination with its Contributor Version (or portions of such combination), to make, use, sell, offer for sale, have made, and/or otherwise dispose of: 1) Modifications made by that Contributor (or portions thereof); and 2) the combination of Modifications made by that Contributor with its Contributor Version (or portions of such combination).

(c) the licenses granted in Sections 2.2(a) and 2.2(b) are effective on the date Contributor first makes Commercial Use of the Covered Code.

(d) Notwithstanding Section 2.2(b) above, no patent license is granted: 1) for any code that Contributor has deleted from the Contributor Version; 2) separate from the Contributor Version; 3) for infringements caused by: i) third party modifications of Contributor Version or ii) the combination of Modifications made by that Contributor with other software (except as part of the Contributor Version) or other devices; or 4) under Patent Claims infringed by Covered Code in the absence of Modifications made by that Contributor.

3. Distribution Obligations.

3.1. Application of License.

The Modifications which You create or to which You contribute are governed by the terms of this License, including without limitation Section 2.2. The Source Code version of Covered Code may be distributed only under the terms of this License or a future version of this License released under Section 6.1, and You must include a copy of this License with every copy of the Source Code You distribute. You may not offer or impose any terms on any Source Code

version that alters or restricts the applicable version of this License or the recipients' rights hereunder. However, You may include an additional document offering the additional rights described in Section 3.5.

3.2. Availability of Source Code.

Any Modification which You create or to which You contribute must be made available in Source Code form under the terms of this License either on the same media as an Executable version or via an accepted Electronic Distribution Mechanism to anyone to whom you made an Executable version available; and if made available via Electronic Distribution Mechanism, must remain available for at least twelve (12) months after the date it initially became available, or at least six (6) months after a subsequent version of that particular Modification has been made available to such recipients. You are responsible for ensuring that the Source Code version remains available even if the Electronic Distribution Mechanism is maintained by a third party.

3.3. Description of Modifications.

You must cause all Covered Code to which You contribute to contain a file documenting the changes You made to create that Covered Code and the date of any change. You must include a prominent statement that the Modification is derived, directly or indirectly, from Original Code provided by the Initial Developer and including the name of the Initial Developer in (a) the Source Code, and (b) in any notice in an Executable version or related documentation in which You describe the origin or ownership of the Covered Code.

3.4. Intellectual Property Matters

(a) Third Party Claims.

If Contributor has knowledge that a license under a third party's intellectual property rights is required to exercise the rights granted by such Contributor under Sections 2.1 or 2.2, Contributor must include a text file with the Source Code distribution titled "LEGAL" which describes the claim and the party making the claim in sufficient detail that a recipient will know whom to contact. If Contributor obtains such knowledge after the Modification is made available as described in Section 3.2, Contributor shall promptly modify the LEGAL file in all copies Contributor makes available thereafter and shall take other steps (such as notifying appropriate mailing lists or newsgroups) reasonably calculated to inform those who received the Covered Code that new knowledge has been obtained.

(b) Contributor APIs.

If Contributor's Modifications include an application programming interface and Contributor has knowledge of patent licenses which are reasonably necessary to implement that API, Contributor must also include this information in the LEGAL file.

(c) Representations.

Contributor represents that, except as disclosed pursuant to Section 3.4(a) above, Contributor believes that Contributor's Modifications are Contributor's original creation(s) and/or Contributor has sufficient rights to grant the rights conveyed by this License.

3.5. Required Notices.

You must duplicate the notice in Exhibit A in each file of the Source Code. If it is not possible to put such notice in a particular Source Code file due to its structure, then You must include such notice in a location (such as a relevant directory) where a user would be likely to look for such a notice. If You created one or more Modification(s) You may add your name as a Contributor to the notice described in Exhibit A. You must also duplicate this License in any documentation for the Source Code where You describe recipients' rights or ownership rights relating to Covered Code. You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Code. However, You may do so only on Your own behalf, and not on behalf of the Initial Developer or any Contributor. You must make it absolutely clear than any such warranty, support, indemnity or liability obligation is offered by You alone, and You hereby agree to indemnify the Initial Developer and every Contributor for any liability incurred by the Initial Developer or such Contributor as a result of warranty, support, indemnity or liability terms You offer.

3.6. Distribution of Executable Versions.

You may distribute Covered Code in Executable form only if the requirements of Section 3.1-3.5 have been met for that Covered Code, and if You include a notice stating that the Source Code version of the Covered Code is available under the terms of this License, including a description of how and where You have fulfilled the obligations of Section 3.2. The notice must be conspicuously included in any notice in an Executable version, related documentation or collateral in which You describe recipients' rights relating to the Covered Code. You may distribute the Executable version of Covered Code or ownership rights under a license of Your choice, which may contain terms different from this License, provided that You are in compliance with the terms of this License and that the license for the

Executable version does not attempt to limit or alter the recipient's rights in the Source Code version from the rights set forth in this License. If You distribute the Executable version under a different license You must make it absolutely clear that any terms which differ from this License are offered by You alone, not by the Initial Developer or any Contributor. You hereby agree to indemnify the Initial Developer and every Contributor for any liability incurred by the Initial Developer or such Contributor as a result of any such terms You offer.

3.7. Larger Works.

You may create a Larger Work by combining Covered Code with other code not governed by the terms of this License and distribute the Larger Work as a single product. In such a case, You must make sure the requirements of this License are fulfilled for the Covered Code.

4. Inability to Comply Due to Statute or Regulation.

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Code due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be included in the LEGAL file described in Section 3.4 and must be included with all distributions of the Source Code. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Application of this License.

This License applies to code to which the Initial Developer has attached the notice in Exhibit A and to related Covered Code.

6. Versions of the License.

6.1. New Versions.

Netscape Communications Corporation ("Netscape") may publish revised and/or new versions of the License from time to time. Each version will be given a distinguishing version number.

6.2. Effect of New Versions.

Once Covered Code has been published under a particular version of the License, You may always continue to use it under the terms of that version. You may also choose to use such Covered Code under the terms of any subsequent version of the License published by Netscape. No one

other than Netscape has the right to modify the terms applicable to Covered Code created under this License.

6.3. Derivative Works.

If You create or use a modified version of this License (which you may only do in order to apply it to code which is not already Covered Code governed by this License), You must (a) rename Your license so that the phrases "Mozilla", "MOZILLAPL", "MOZPL", "Netscape", "MPL", "NPL" or any confusingly similar phrase do not appear in your license (except to note that your license differs from this License) and (b) otherwise make it clear that Your version of the license contains terms which differ from the Mozilla Public License and Netscape Public License. (Filling in the name of the Initial Developer, Original Code or Contributor in the notice described in Exhibit A shall not of themselves be deemed to be modifications of this License.)

7. DISCLAIMER OF WARRANTY.

COVERED CODE IS PROVIDED UNDER THIS LICENSE ON AN "AS IS" BASIS, WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, WITHOUT LIMITATION, WARRANTIES THAT THE COVERED CODE IS FREE OF DEFECTS, MERCHANTABILITY, FIT FOR A PARTICULAR PURPOSE OR NON-INFRINGEMENT. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE COVERED CODE IS WITH YOU. SHOULD ANY COVERED CODE PROVE DEFECTIVE IN ANY RESPECT, YOU (NOT THE INITIAL DEVELOPER OR ANY OTHER CONTRIBUTOR) ASSUME THE COST OF ANY NECESSARY SERVICING, REPAIR OR CORRECTION. THIS DISCLAIMER OF WARRANTY CONSTITUTES AN ESSENTIAL PART OF THIS LICENSE. NO USE OF ANY COVERED CODE IS AUTHORIZED HEREUNDER EXCEPT UNDER THIS DISCLAIMER.

8. TERMINATION.

8.1. This License and the rights granted hereunder will terminate automatically if You fail to comply with terms herein and fail to cure such breach within 30 days of becoming aware of the breach. All sublicenses to the Covered Code which are properly granted shall survive any termination of this License. Provisions which, by their nature, must remain in effect beyond the termination of this License shall survive.

8.2. If You initiate litigation by asserting a patent infringement claim (excluding declaratory judgment actions) against Initial Developer or a Contributor (the Initial Developer or Contributor against whom You file such action is referred to as "Participant") alleging that:

(a) such Participant's Contributor Version directly or indirectly infringes any patent, then any and all rights granted by such Participant to You under Sections 2.1 and/or 2.2 of this License shall, upon 60 days notice from Participant terminate prospectively, unless if within 60 days after receipt of notice You either: (i) agree in writing to pay Participant a mutually agreeable reasonable royalty for Your past and future use of Modifications made by such Participant, or (ii) withdraw Your litigation claim with respect to

the Contributor Version against such Participant. If within 60 days of notice, a reasonable royalty and payment arrangement are not mutually agreed upon in writing by the parties or the litigation claim is not withdrawn, the rights granted by Participant to You under Sections 2.1 and/or 2.2 automatically terminate at the expiration of the 60 day notice period specified above.

(b) any software, hardware, or device, other than such Participant's Contributor Version, directly or indirectly infringes any patent, then any rights granted to You by such Participant under Sections 2.1(b) and 2.2(b) are revoked effective as of the date You first made, used, sold, distributed, or had made, Modifications made by that Participant.

8.3. If You assert a patent infringement claim against Participant alleging that such Participant's Contributor Version directly or indirectly infringes any patent where such claim is resolved (such as by license or settlement) prior to the initiation of patent infringement litigation, then the reasonable value of the licenses granted by such Participant under Sections 2.1 or 2.2 shall be taken into account in determining the amount or value of any payment or license.

8.4. In the event of termination under Sections 8.1 or 8.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or any distributor hereunder prior to termination shall survive termination.

9. LIMITATION OF LIABILITY.

UNDER NO CIRCUMSTANCES AND UNDER NO LEGAL THEORY, WHETHER TORT (INCLUDING NEGLIGENCE), CONTRACT, OR OTHERWISE, SHALL YOU, THE INITIAL DEVELOPER, ANY OTHER CONTRIBUTOR, OR ANY DISTRIBUTOR OF COVERED CODE, OR ANY SUPPLIER OF ANY OF SUCH PARTIES, BE LIABLE TO ANY PERSON FOR ANY INDIRECT, SPECIAL, INCIDENTAL, OR CONSEQUENTIAL DAMAGES OF ANY CHARACTER INCLUDING, WITHOUT LIMITATION, DAMAGES FOR LOSS OF GOODWILL, WORK STOPPAGE, COMPUTER FAILURE OR MALFUNCTION, OR ANY AND ALL OTHER

COMMERCIAL DAMAGES OR LOSSES, EVEN IF SUCH PARTY SHALL HAVE BEEN INFORMED OF THE POSSIBILITY OF SUCH DAMAGES. THIS LIMITATION OF LIABILITY SHALL NOT APPLY TO LIABILITY FOR DEATH OR PERSONAL INJURY RESULTING FROM SUCH PARTY'S NEGLIGENCE TO THE EXTENT APPLICABLE LAW PROHIBITS SUCH LIMITATION. SOME JURISDICTIONS DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THIS EXCLUSION AND LIMITATION MAY NOT APPLY TO YOU.

10. U.S. GOVERNMENT END USERS.

The Covered Code is a "commercial item," as that term is defined in 48 C.F.R. 2.101 (Oct. 1995), consisting of "commercial computer software" and "commercial computer software documentation," as such terms are used in 48 C.F.R. 12.212 (Sept. 1995). Consistent with 48

C.F.R. 12.212 and 48 C.F.R. 227.7202-1 through 227.7202-4 (June 1995), all U.S. Government End Users acquire Covered Code with only those rights set forth herein.

11. MISCELLANEOUS.

This License represents the complete agreement concerning subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. This License shall be governed by California law provisions (except to the extent applicable law, if any, provides otherwise), excluding its conflict-of-law provisions. With respect to disputes in which at least one party is a citizen of, or an entity chartered or registered to do business in the United States of America, any litigation relating to this License shall be subject to the jurisdiction of the Federal Courts of the Northern District of California, with venue lying in Santa Clara

County,

California, with the losing party responsible for costs, including without limitation, court costs and reasonable attorneys' fees and expenses. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not apply to this License.

12. RESPONSIBILITY FOR CLAIMS.

As between Initial Developer and the Contributors, each party is responsible for claims and damages arising, directly or indirectly, out of its utilization of rights under this License and You agree to work with Initial Developer and Contributors to distribute such responsibility on an equitable basis. Nothing herein is intended or

shall be deemed to constitute any admission of liability.

13. MULTIPLE-LICENSED CODE.

Initial Developer may designate portions of the Covered Code as

"Multiple-Licensed". "Multiple-Licensed" means that the Initial Developer permits you to utilize portions of the Covered Code under Your choice of the NPL or the alternative licenses, if any, specified by the Initial Developer in the file described in Exhibit A.

EXHIBIT A -Mozilla Public License.

"The contents of this file are subject to the Mozilla Public License Version 1.1 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <http://www.mozilla.org/MPL/>

Software distributed under the License is distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License for the specific language governing rights and limitations under the License.

The Original Code is _____.

The Initial Developer of the Original Code is _____.
Portions created by _____ are Copyright (C) _____
_____. All Rights Reserved.

Contributor(s): _____.

Alternatively, the contents of this file may be used under the terms of the _____ license (the "[_____] License"), in which case the provisions of [_____] License are applicable instead of those above. If you wish to allow use of your version of this file only under the terms of the [_____] License and not to allow others to use your version of this file under the MPL, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the [_____] License. If you do not delete the provisions above, a recipient may use your version of this file under either the MPL or the [_____] License."

[NOTE: The text of this Exhibit A may differ slightly from the text of the notices in the Source Code files of the Original Code. You should use the text of this Exhibit A rather than the text found in the Original Code Source Code for Your Modifications.]

1.85 consolekit 0.4.1-3.el6

1.85.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute

and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such

parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through

any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands `show
w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.86 lsscsi 0.23-2.el6

1.86.1 Available under license :

This package was debianized by Matt Taggart <taggart@debian.org> on
Wed, 2 Feb 2005 00:27:11 -0800.

It was downloaded from <http://sg.danny.cz/scsi/lsscsi.html>

Copyright: Copyright (C) 2003-2008 D. Gilbert

Upstream Author: Doug Gilbert <dgilbert@interlog.com>

License:

This package is free software; you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by
the Free Software Foundation; version 2 dated June, 1991.

This package is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this package; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301, USA.

On Debian systems, the complete text of the GNU General Public License can be found in ``usr/share/common-licenses/GPL'`.
GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the

source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you

conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or

collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or

distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the

integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES

PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give  
the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version 2 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program; if not, write to the Free Software  
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
```

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.87 libpng 1.2.49-1.el6_2

1.87.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further

restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to

time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name
and a brief idea of what it does.>
Copyright (C) <year> <name of author>
```

```
This program is free software; you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by
the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
```

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type 'show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type 'show c' for details.
```

The hypothetical commands 'show w' and 'show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than 'show w' and 'show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program 'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public

License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

This copy of the libpng notices is provided for your convenience. In case of any discrepancy between this copy and the notices in the file png.h that is included in the libpng distribution, the latter shall prevail.

COPYRIGHT NOTICE, DISCLAIMER, and LICENSE:

If you modify libpng you may insert additional notices immediately following this sentence.

This code is released under the libpng license.

libpng versions 1.2.6, August 15, 2004, through 1.2.49, March 29, 2012, are Copyright (c) 2004, 2006-2009 Glenn Randers-Pehrson, and are distributed according to the same disclaimer and license as libpng-1.2.5 with the following individual added to the list of Contributing Authors

Cosmin Truta

libpng versions 1.0.7, July 1, 2000, through 1.2.5 - October 3, 2002, are Copyright (c) 2000-2002 Glenn Randers-Pehrson, and are distributed according to the same disclaimer and license as libpng-1.0.6 with the following individuals added to the list of Contributing Authors

Simon-Pierre Cadieux
Eric S. Raymond
Gilles Vollant

and with the following additions to the disclaimer:

There is no warranty against interference with your enjoyment of the library or against infringement. There is no warranty that our efforts or the library will fulfill any of your particular purposes or needs. This library is provided with all faults, and the entire risk of satisfactory quality, performance, accuracy, and effort is with the user.

libpng versions 0.97, January 1998, through 1.0.6, March 20, 2000, are Copyright (c) 1998, 1999 Glenn Randers-Pehrson, and are distributed according to the same disclaimer and license as libpng-0.96, with the following individuals added to the list of Contributing Authors:

Tom Lane
Glenn Randers-Pehrson
Willem van Schaik

libpng versions 0.89, June 1996, through 0.96, May 1997, are Copyright (c) 1996, 1997 Andreas Dilger
Distributed according to the same disclaimer and license as libpng-0.88, with the following individuals added to the list of Contributing Authors:

John Bowler
Kevin Bracey
Sam Bushell
Magnus Holmgren
Greg Roelofs
Tom Tanner

libpng versions 0.5, May 1995, through 0.88, January 1996, are Copyright (c) 1995, 1996 Guy Eric Schalnat, Group 42, Inc.

For the purposes of this copyright and license, "Contributing Authors" is defined as the following set of individuals:

Andreas Dilger
Dave Martindale
Guy Eric Schalnat
Paul Schmidt
Tim Wegner

The PNG Reference Library is supplied "AS IS". The Contributing Authors and Group 42, Inc. disclaim all warranties, expressed or implied, including, without limitation, the warranties of merchantability and of fitness for any purpose. The Contributing Authors and Group 42, Inc. assume no liability for direct, indirect, incidental, special, exemplary, or consequential damages, which may result from the use of the PNG Reference Library, even if advised of the possibility of such damage.

Permission is hereby granted to use, copy, modify, and distribute this source code, or portions hereof, for any purpose, without fee, subject to the following restrictions:

1. The origin of this source code must not be misrepresented.

2. Altered versions must be plainly marked as such and must not be misrepresented as being the original source.
3. This Copyright notice may not be removed or altered from any source or altered source distribution.

The Contributing Authors and Group 42, Inc. specifically permit, without fee, and encourage the use of this source code as a component to supporting the PNG file format in commercial products. If you use this source code in a product, acknowledgment is not required but would be appreciated.

A "png_get_copyright" function is available, for convenient use in "about" boxes and the like:

```
printf("%s",png_get_copyright(NULL));
```

Also, the PNG logo (in PNG format, of course) is supplied in the files "pngbar.png" and "pngbar.jpg (88x31) and "pngnow.png" (98x31).

Libpng is OSI Certified Open Source Software. OSI Certified Open Source is a certification mark of the Open Source Initiative.

Glenn Randers-Pehrson
glennrp at users.sourceforge.net
March 29, 2012

Copyright (c) 1998-2008 Greg Roelofs. All rights reserved.

This software is provided "as is," without warranty of any kind, express or implied. In no event shall the author or contributors be held liable for any damages arising in any way from the use of this software.

The contents of this file are DUAL-LICENSED. You may modify and/or redistribute this software according to the terms of one of the following two licenses (at your option):

LICENSE 1 ("BSD-like with advertising clause"):

Permission is granted to anyone to use this software for any purpose, including commercial applications, and to alter it and redistribute it freely, subject to the following restrictions:

1. Redistributions of source code must retain the above copyright notice, disclaimer, and this list of conditions.
2. Redistributions in binary form must reproduce the above copyright notice, disclaimer, and this list of conditions in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgment:

This product includes software developed by Greg Roelofs and contributors for the book, "PNG: The Definitive Guide," published by O'Reilly and Associates.

LICENSE 2 (GNU GPL v2 or later):

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of

MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

1.88 libcanberra 0.22-1.el6.centos

1.88.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence

the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can

use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original

author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU

operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for

writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered

independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License

instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not

compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one

of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally

accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities.

This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library

specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting

redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.89 expat 2.0.1-11.el6_2

1.89.1 Available under license :

Copyright (c) 1998, 1999, 2000 Thai Open Source Software Center Ltd
and Clark Cooper
Copyright (c) 2001, 2002, 2003, 2004, 2005, 2006 Expat maintainers.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.90 libnotify 0.5.0-1.el6

1.90.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a

"work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE
TERMS
AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the

Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest

your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it

contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section

6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables

containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified

executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then

the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free

Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.91 ncurses 5.7-3.20090208.el6

1.91.1 Available under license :

```
*****  
dnl Copyright (c) 2000,2006 Free Software Foundation, Inc.      *  
dnl                                                              *  
dnl Permission is hereby granted, free of charge, to any person obtaining a *  
dnl copy of this software and associated documentation files (the *  
dnl "Software"), to deal in the Software without restriction, including *  
dnl without limitation the rights to use, copy, modify, merge, publish, *  
dnl distribute, distribute with modifications, sublicense, and/or sell *  
dnl copies of the Software, and to permit persons to whom the Software is *  
dnl furnished to do so, subject to the following conditions:      *  
dnl                                                              *  
dnl The above copyright notice and this permission notice shall be included *  
dnl in all copies or substantial portions of
```

```

the Software.          *
dnl
dnl THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS *
dnl OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF          *
dnl MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. *
dnl IN NO EVENT SHALL THE ABOVE COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, *
dnl DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR *
dnl OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR *
dnl THE USE OR OTHER DEALINGS IN THE SOFTWARE.          *
dnl
dnl Except as contained in this notice, the name(s) of the above copyright *
dnl holders shall not be used in advertising or otherwise to promote the *
dnl sale, use or other dealings in this Software without prior written *
dnl
authorization.          *
dnl*****
# This file is free software; you can redistribute it and/or modify it
# under the terms of the GNU General Public License as published by
# the Free Software Foundation; either version 2 of the License, or
# (at your option) any later version.
#
# This program is distributed in the hope that it will be useful, but
# WITHOUT ANY WARRANTY; without even the implied warranty of
# MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
# General Public License for more details.
#
# You should have received a copy of the GNU General Public License
# along with this program; if not, write to the Free Software
# Foundation, Inc., 51 Franklin Street - Fifth Floor, Boston, MA
# 02110-1301, USA.
#
# As a special exception to the GNU General Public License, if you
# distribute this file as part of a program that contains a
# configuration script generated by Autoconf, you may include it under
# the same distribution terms that you use for the rest of that program.
#
# Originally written by Per Bothner <per@bothner.com>.
# Please send patches to <config-patches@gnu.org>. Submit a context
# diff and a properly formatted ChangeLog entry.
#
# This script attempts to guess a canonical system name similar to
# config.sub. If it succeeds, it prints the system name on stdout, and
# exits with 0. Otherwise, it exits with 1.
#
# The plan is that this can be called by configure scripts if you
# don't specify an explicit build system type.

```

1.92 libglade 2.6.4-3.1.el6

1.92.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes

to the library and recompiling
it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while

preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based

on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must

be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If

identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the

Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to

distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the

copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on

the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute

the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free

programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name
of author>

This library is free software; you can redistribute it and/or
modify it under the terms of the GNU Library General Public
License as published by the Free Software Foundation; either
version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
Library General Public License for more details.

You should have received a copy of the GNU Library General Public
License along with this library; if not, write to the Free
Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the library, if
necessary. Here is a sample; alter the
names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the
library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.93 libconfig 1.3.2-1.1.el6

1.93.1 Available under license :

This package was debianized by Jose Luis Tallon <jltallon@adv-solutions.net> on
Tue, 10 Oct 2006 01:42:09 +0200.

It was downloaded from <http://www.hyperrealm.com/libconfig>

Upstream Author: Mark A Lindner

Mark Lindner - Lead developer & maintainer.

Daniel Marjamdki - Enhancements & bugfixes.

Andrew Tytula - Windows Port.

Glenn Herteg - Enhancements, bugfixes, documentation corrections.

Copyright: Copyright (C) 2005-2008 Mark A Lindner

License: (LGPL-2.1)

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

On Debian systems,
the full text of GNU's Lesser General Public License can
be found at /usr/share/common-licenses/LGPL-2.1

The Debian packaging is (C) 2006-2008, Jose Luis Tallon <jltallon@adv-solutions.net>
and is licensed under the GPL, see `/usr/share/common-licenses/GPL'.

This package was debianized by Klaus Schneider <kschn@users.sourceforge.net> on
Mon, 25 Jun 2007 16:21:56 +0200.

It was downloaded from <http://www.hyperrealm.com/libconfig/libconfig.html>

Upstream Author: Mark A. Lindner

Copyright: (c) 2005-2009 Mark A. Lindner

License:

This package is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This package is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See
the GNU
Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public
License along with this package; if not, write to the Free Software

Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

On Debian systems, the complete text of the GNU Lesser General Public License can be found in ``usr/share/common-licenses/LGPL'`.

The Debian packaging is (C) 2007, Klaus Schneider <kschn@users.sourceforge.net> and is licensed under the GPL, see ``usr/share/common-licenses/GPL'`.

Copyright (C) 1996, 1997, 1998, 1999, 2001, 2002, 2003, 2004

Free Software Foundation, Inc.

#

Written by Tom Tromey <tromey@cygnus.com>.

#

This program is free software; you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by
the Free Software Foundation; either version 2, or (at your option)
any later version.

#

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

#

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA.

As a special exception to the GNU General Public License, if you
distribute this file as part of a program that contains a
configuration script generated by Autoconf,
you may include it under
the same distribution terms that you use for the rest of that program.

This file is maintained in Automake, please report
bugs to <bug-automake@gnu.org> or send patches to
<automake-patches@gnu.org>.

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it.

You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language.

(Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you

distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the

Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library".

The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the

complete corresponding

machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed

(in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not

excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by

the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library.
It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.94 libarchive 2.8.3-4.el6_2

1.94.1 Available under license :

The libarchive distribution as a whole is Copyright by Tim Kientzle and is subject to the copyright notice reproduced at the bottom of this file.

Each individual file in this distribution should have a clear copyright/licensing statement at the beginning of the file. If any do not, please let me know and I will rectify it. The following is intended to summarize the copyright status of the individual files; the actual statements in the files are controlling.

* Except as listed below, all C sources (including .c and .h files) and documentation files are subject to the copyright notice reproduced at the bottom of this file.

* The following source files are also subject in whole or in part to a 3-clause UC Regents copyright; please read the individual source files for details:

libarchive/archive_entry.c
libarchive/archive_read_support_compression_compress.c
libarchive/archive_write_set_compression_compress.c
libarchive/mtree.5
tar/matching.c

* The following source files are in the public domain:
tar/getdate.c

* The build files---including Makefiles, configure scripts, and auxiliary scripts used as part of the compile process---have widely varying licensing terms. Please check individual files before distributing them to see if those restrictions apply to you.

I intend for all new source code to use the license below and hope over time to replace code with other licenses with new implementations that do use the license below. The varying licensing of the build scripts seems to be an unavoidable mess.

Copyright (c) 2003-2009 <author(s)>
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer in this position and unchanged.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR(S) ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.95 libogg 1.1.4-2.1.e16

1.95.1 Available under license :

Copyright (c) 2002, Xiph.org Foundation

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- Neither the name of the Xiph.org Foundation nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.96 libsepol 2.0.41-4.el6

1.96.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source

code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without

limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or

table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing

the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the

original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the

library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

1.97 libcap-ng 0.6.4-3.el6_0.1

1.97.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data

prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices

stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2,

instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline

functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute

the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2)

will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or

distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made

generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE

IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it

in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered

independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary

form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then

the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free

Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,

or

(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and
`show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
```

```
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.98 popt 1.13-7.el6

1.98.1 Available under license :

Copyright (c) 1998 Red Hat Software

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE X CONSORTIUM BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the X Consortium shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the X Consortium.

1.99 libcap 2.16-5.5.el6

1.99.1 Available under license :

Unless otherwise *explicitly* stated the following text describes the licensed conditions under which the contents of this module release may be distributed:

Redistribution and use in source and binary forms of this module, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain any existing copyright notice, and this entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce all prior and current copyright notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided

with the distribution.

3. The name of any author may not be used to endorse or promote products derived from this software without their specific prior written permission.

ALTERNATIVELY, this product may be distributed under the terms of the GNU Library General Public License, in which case the provisions of the GNU LGPL are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential conflict between the GNU LGPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Unless otherwise **explicitly** stated, the following text describes the licensed conditions under which the contents of this libcap release may be used and distributed:

Redistribution and use in source and binary forms of libcap, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain any existing copyright notice, and this entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce all prior and current copyright notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of any author may not be used to endorse or promote products derived from this software without their specific prior written permission.

ALTERNATIVELY, this product may be distributed

under the terms of the GNU General Public License, in which case the provisions of the GNU GPL are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential conflict between the GNU GPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.100 dmraid 1.0.0.rc16-11.el6

1.100.1 Available under license :

Copyright (C) 2004-2006 Heinz Mauelshagen, Red Hat GmbH.
All rights reserved.

This dmraid code is free software;
you can redistribute and/or modify it under the terms of
the GNU General Public License as published by the
Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

dmraid is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
General Public License for more details.

You should have received a copy of the GNU (Lesser) General Public
License along with this dmraid code; if not, write to the Free
Software Foundation, Inc., 59 Temple Place - Suite 330, Boston,
MA 02111-1307, USA

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies

of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that

there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free

programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from

such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If

identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the

source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the

copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute

so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time.

Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that

everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any

patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish,

that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can

be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program

(or a work based on it,

under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your

cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates

the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands

`show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.101 attr 2.4.44-7.el6

1.101.1 Available under license :

This package was debianized by Nathan Scott nathans@debian.org on
Sun, 19 Nov 2000 07:37:09 -0500.

It can be downloaded from <ftp://oss.sgi.com/projects/xfs/download/>

Copyright:

Copyright (C) 2001-2002 Silicon Graphics, Inc. All Rights Reserved.
Copyright (C) 2001 Andreas Gruenbacher.

You are free to distribute this software under Version 2.1
of the GNU Lesser General Public License.
On Debian systems, refer to /usr/share/common-licenses/LGPL-2.1
for the complete text of the GNU Lesser General Public License.

Certain components (as annotated in the source) are licensed
under version 2 of the terms of the GNU General Public License.
On Debian systems, the complete text of the GNU General Public
License can be found in /usr/share/common-licenses/GPL file.
Most components of the "attr" package are licensed under
Version 2.1 of the GNU Lesser General Public License (see COPYING.LGPL).

Some components (as annotated in the source) are licensed
under Version 2 of the GNU General Public License (see below),

GNU GENERAL PUBLIC LICENSE

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original

authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications

or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions

are

prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation
may publish revised and/or new versions
of the General Public License from time to time. Such new versions will
be similar in spirit to the present version, but may differ in detail to
address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision
will be guided by the two goals
of preserving the free status of all derivatives of our free software and
of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU

FOR DAMAGES,
INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING
OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED
TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY
YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER
PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE
POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts
in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it

under certain conditions; type ``show c'` for details.

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License
does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Lesser General
Public License instead of this License.

1.102 libthai 0.1.12-3.el6

1.102.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be

consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and

modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any

warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library

creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the

user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise

permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any

other library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by

all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these,

write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.103 gpgme 1.1.8-3.el6

1.103.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third

parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium

customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to

these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions

of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who
decide to use it. You
can use it too, but we suggest you first think carefully about whether
this license or the ordinary General Public License is the better
strategy to use in any particular case, based on the explanations
below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of
it in new free programs; and that you are informed that you can do
these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with

the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data

prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the

ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object

file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute

the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a)

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will

operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least

three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your

rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed

through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR

PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public

License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.104 slang 2.2.1-1.e16

1.104.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can

be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary

form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then

the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free

Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version
```

2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands
`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.105 cracklib 2.8.16-4.el6

1.105.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library,

whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many

libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under

copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for

that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may

distribute

the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2)

will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy

from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not

signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited

by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN

WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

This package was debianized by Jean Pierre LeJacq <jplejacq@quoininc.com> on Wed, 25 Feb 1998. Martin Pitt <martin@piware.de> was the package's maintainer up to version 2.7.19-1. The current maintainer is Jan Dittberner <jandd@debian.org>.

It was downloaded from <http://sourceforge.net/projects/cracklib>

Copyright (c) 1993 Alec Muffett <alecm@crypto.dircon.co.uk>,
Copyright (c) 2005-2009 Nathan Neulinger <nneul@umr.edu>,
Copyright (c) 2008-2009 Jan Dittberner <jan@dittberner.info>

Modifications: Added cronjob, configuration file, and man pages.

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

A copy of the GNU Lesser General Public License 2.1 is available as /usr/share/common-licenses/LGPL-2.1 in the Debian GNU/Linux distribution or on the World Wide Web at <http://www.gnu.org/licenses/old-licenses/lgpl-2.1.html>. You can also obtain it by writing to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301, USA.

Copyright information:

CrackLib was originally licensed with a variant of the Artistic license. In the interests of wider acceptance and more modern licensing, it was switched with the original author's blessing to GPL v2.

This approval was carried out in email discussions in 2005, and has been reconfirmed as of 2007-10-01 with the following email from Alec Muffett. Cracklib's license was changed from the GPL to the LGPL after consensus of all previous developers in October 2008, effective with release 2.8.15 released on 2009-11-19. See the email discussion below for both license changes.

EFFECTIVE

OCT 2008, LICENSE IS BEING CHANGED TO LGPL-2.1 (though not reflected in released code until Nov 2009 - slow release cycle...)

Discussion thread from mailing list archive, with approval from everyone actively involved or holding original licensing rights included.

[Cracklib-devel] cracklib license

From: Mike Frysinger <vapier@ge...> - 2007-10-02 01:16

Attachments: Message as HTML

looks like 2.8.11 is out and marked as "GPL-2" ... releasing libraries unde=
r=20

GPL-2 is not desirable at all ... this is why the LGPL-2.1 exists
=2Dmike

Re: [Cracklib-devel] cracklib license

From: Neulinger, Nathan <nneul@um...> - 2007-10-02 01:18

I understand that, and you're welcome to bring it up with Alec directly and see if he wants to relicense his code as LGPL... but at this point, it was enough to just get it consistent and documented as to what it was released under. This wasn't actually a license change, just a clarification of the licensing that was already in place.=20

-- Nathan

=20

Nathan Neulinger EMail: nneul@um...
University of Missouri - Rolla Phone: (573) 341-6679
UMR Information Technology Fax: (573) 341-4216

> -----Original Message-----

> From: cracklib-devel-bounces@li...
> [mailto:cracklib-devel-bounces@li...] On Behalf Of
> Mike Frysinger
> Sent: Monday, October 01, 2007 8:15 PM
> To: cracklib-devel@li...
> Subject: [Cracklib-devel] cracklib license

>=20

> looks like 2.8.11 is out and marked as "GPL-2" ... releasing
> libraries under
> GPL-2 is not desirable at all ... this is why the LGPL-2.1 exists
> -mike

Re: [Cracklib-devel] cracklib license
From: Mike Frysinger <vapier@ge...> - 2007-10-02 01:33

Attachments: Message as HTML

On Monday 01 October 2007, Neulinger, Nathan wrote:

> I understand that, and you're welcome to bring it up with Alec directly
> and see if he wants to relicense his code as LGPL... but at this point,
> it was enough to just get it consistent and documented as to what it was
> released under. This wasn't actually a license change, just a
> clarification of the licensing that was already in place.

the original license (before moving to sourceforge -- aka, 2.7) was not=20
GPL-2 ... it was a modified artistic license ... i didnt notice the license=
=20

change until it was mentioned in the latest notes.

unlike the old license, GPL-2 prevents people from using cracklib unless th=
eir=20

applications are also GPL-2 which imo is just wrong. it isnt the place of =
a=20

library to dictact to application writes what license they should be using.=
=20

thus LGPL-2.1 enters to fill this void.

=2Dmike

Re: [Cracklib-devel] cracklib license

From: Neulinger, Nathan <nneul@um...> - 2007-10-02 01:46

Seems like the ideal thing here would be for you and the other distro maintainers to get together with Alec in a conversation and come to a decision as to what licensing scheme y'all want. I haven't really done much other than cleaning up the packaging and patches and a small bit of additional code, so whatever licensing y'all come up with is fine by me.

-- Nathan

=20

Nathan Neulinger EMail: nneul@um...

University of Missouri - Rolla Phone: (573) 341-6679

UMR Information Technology Fax: (573) 341-4216

> -----Original Message-----

> From: cracklib-devel-bounces@li...

> [mailto:cracklib-devel-bounces@li...] On Behalf Of

> Mike Frysinger

> Sent: Monday, October 01, 2007 8:33 PM

> To: Neulinger, Nathan

>

Cc: cracklib-devel@li...; Alec Muffett

> Subject: Re: [Cracklib-devel] cracklib license

>=20

> On Monday 01 October 2007, Neulinger, Nathan wrote:

> > I understand that, and you're welcome to bring it up with Alec

> directly

> > and see if he wants to relicense his code as LGPL... but at this

> point,

> > it was enough to just get it consistent and documented as to what

> it was

> > released under. This wasn't actually a license change, just a

> > clarification of the licensing that was already in place.

>=20

> the original license (before moving to sourceforge -- aka, 2.7) was

> not

> GPL-2 ... it was a modified artistic license ... i didnt notice the

> license

> change until it was mentioned in the latest notes.

>=20

> unlike the old license, GPL-2 prevents people from using cracklib

> unless their

> applications are also GPL-2 which imo is just wrong. it isnt

the

> place of a

> library to dictact to application writes what license they should

> be using.
> thus LGPL-2.1 enters to fill this void.
> -mike

Re: [Cracklib-devel] cracklib license

From: Alec Muffett <alecm@cr...> - 2007-10-02 08:57

> Seems like the ideal thing here would be for you and the other distro
> maintainers to get together with Alec in a conversation and come to a
> decision as to what licensing scheme y'all want. I haven't really done
> much other than cleaning up the packaging and patches and a small
> bit of
> additional code, so whatever licensing y'all come up with is fine
> by me.

I am sympathetic. Guys, what do you reckon?

What I am hearing so far is that LGPL makes sense, since it can be
linked with any code, not just GPL...

-a

Re: [Cracklib-devel] cracklib license

From: Devin Reade <gdr@gn...> - 2007-10-02 15:04

I would

like to see it under LGPL as well. I think it is in everyone's
best interests to have as secure systems as possible, and I think tainting
it via GPL will just make it less likely that the library gets used, and
will not usually cause companies/developers to GPL the dependent code
(where it is not already GPL).

I like GPL, I use it when I can, but I don't think that it's the correct
license in this situation.

Devin

--

If it's sinful, it's more fun.

Re: [Cracklib-devel] cracklib license

From: Nalin Dahyabhai <naln@re...> - 2008-01-28 16:32

On Tue, Oct 02, 2007 at 09:57:31AM +0100, Alec Muffett wrote:

>> Seems like the ideal thing here would be for you and the other distro
>> maintainers to get together with Alec in a conversation and come to a
>> decision as to what licensing scheme y'all want. I haven't really done
>> much other than cleaning up the packaging and patches

and a small

>> bit of
>> additional code, so whatever licensing y'all come up with is fine
>> by me.
>
> I am sympathetic. Guys, what do you reckon?
>
> What I am hearing so far is that LGPL makes sense, since it can be
> linked with any code, not just GPL...

My apologies for not chiming in in anything resembling a reasonable timeframe.

I'd also suggest the LGPL, for the reason you noted above. Alternately, GPLv2 with the option of using the library under a later version of the GPL would permit applications which were released under version 3 of the GPL to use the library, too, which would be sufficient for the packages which are included in Fedora. FWIW, I'd personally lean toward LGPL.

In any case, I thank you both for working on sorting this out.

Cheers,

Nalin

Re: [Cracklib-devel] cracklib license

From: Mike Frysinger <vapier@ge...> - 2008-10-05 21:27

Attachments: Message as HTML

On Monday 28 January 2008, Nalin Dahyabhai wrote:

> On Tue, Oct 02, 2007 at 09:57:31AM +0100, Alec Muffett wrote:
>>> Seems like the ideal thing here would be for you and the other distro
>>> maintainers to get together with Alec in a conversation and come to a
>>> decision as to what licensing scheme y'all want. I haven't really done
>>> much other than cleaning up the packaging and patches and a small
>>> bit of
>>> additional code, so whatever licensing y'all come up with is fine
>>> by me.
>>
>> I am sympathetic. Guys, what do you reckon?
>>
>> What I am hearing so far is that LGPL makes sense, since it can be
>> linked with any code, not just GPL...
>
> My apologies for not chiming in in anything resembling a reasonable
> timeframe.
>

> I'd also suggest the LGPL, for the reason you noted above. Alternately,
> GPLv2 with the option of using the library under a later version of the
> GPL would permit applications which were released under version 3 of the
> GPL to use the library, too, which would be sufficient for the packages
> which are included in Fedora. FWIW, I'd personally lean toward LGPL.
>
> In any case, I thank you both for working on sorting this out.

looks like everyone is OK with LGPL-2.1 (GNU Lesser license), so can we make
the change now ?

-mike

Re: [Cracklib-devel] cracklib license

From: Alec Muffett <alecm@cr...> - 2008-10-05 23:18

>> In any case, I thank you both for working on sorting this out.

>

> looks like everyone is OK with LGPL-2.1 (GNU Lesser license), so can we make
> the change now ?

yes. go for it. thanks++

-a

Re: [Cracklib-devel] cracklib license

From: Mike Frysinger <vapier@ge...> - 2008-10-25 22:34

Attachments: Message

as HTML

On Sunday 05 October 2008, Alec Muffett wrote:

> >> In any case, I thank you both for working on sorting this out.

> >

> > looks like everyone is OK with LGPL-2.1 (GNU Lesser license), so can we
> > make the change now ?

>

> yes. go for it. thanks++

Nathan Neulinger is the only one who can actually make said change ...

-mike

BELOW IS ORIGINAL LICENSING DISCUSSION RE CHANGING TO GPL from Artistic.

CrackLib was originally licensed with a variant of the Artistic license. In the

interests of wider acceptance and more modern licensing, it was switched with the original author's blessing to GPL v2.

This approval was carried out in email discussions in 2005, and has been reconfirmed as of 2007-10-01 with the following email from Alec Muffett.

The below email references nneul@umr.edu address, as that is the address that was used at the time. For any future emails regarding this, please use
nneul@neulinger.org.

From alecm@crypticide.com Mon Oct 1 12:26:03 2007
Received: from umr-exproto2.cc.umr.edu ([131.151.0.192]) by UMR-CMAIL1.umr.edu with Microsoft SMTPSVC(6.0.3790.3959);
Mon, 1 Oct 2007 12:26:03 -0500
Received: from scansrv2.srv.mst.edu ([131.151.1.114]) by umr-exproto2.cc.umr.edu with Microsoft SMTPSVC(6.0.3790.3959);
Mon, 1 Oct 2007 12:26:02 -0500
Received: (gmail 8022 invoked from network); 1 Oct 2007 16:59:55 -0000
Received: from smtp1.srv.mst.edu (131.151.1.43)
by scanin-ipvs.cc.umr.edu with SMTP; 1 Oct 2007 16:59:55 -0000
Received: from spunkymail-mx8.g.dreamhost.com (mx1.spunky.mail.dreamhost.com [208.97.132.47])
by smtp1.srv.mst.edu (8.13.1/8.13.1) with ESMTP id 191Gxtp020623
for <nneul@umr.edu>; Mon, 1 Oct 2007 11:59:55 -0500
Received: from rutherford.zen.co.uk (rutherford.zen.co.uk [212.23.3.142])
by spunkymail-mx8.g.dreamhost.com (Postfix) with ESMTP id 2C7734D311
for <nneul@neulinger.org>; Mon, 1 Oct
2007 09:59:50 -0700 (PDT)
Received: from [82.68.43.14] (helo=[192.168.1.3])
by rutherford.zen.co.uk with esmtp (Exim 4.50)
id 1IcOcX-0004Qt-6L
for nneul@neulinger.org; Mon, 01 Oct 2007 16:59:49 +0000
Mime-Version: 1.0 (Apple Message framework v752.2)
In-Reply-To: <1b1b3fd80710010908k11dac0afp1f2dd471059ff9a4@mail.gmail.com>
References: <1190922867.3457.147.camel@localhost.localdomain>
<EC90713277D2BE41B7110CCD74E235CEF44F38@UMR-CMAIL1.umr.edu>
<1b1b3fd80710010908k11dac0afp1f2dd471059ff9a4@mail.gmail.com>
Content-Type: text/plain; charset=US-ASCII; delsp=yes; format=flowed
Message-Id: <117A1264-F6DC-4E25-B0DD-56FBFE6E9F@crypticide.com>
Content-Transfer-Encoding: 7bit
From: Alec Muffett <alecm@crypticide.com>
Subject: Re: cracklib license
Date: Mon, 1 Oct 2007 17:59:46 +0100
To: Nathan Neulinger <nneul@neulinger.org>

X-Mailer: Apple Mail (2.752.2)
X-Originating-Rutherford-IP: [82.68.43.14]
Return-Path: alecm@crypticide.com
X-OriginalArrivalTime: 01 Oct 2007 17:26:03.0008 (UTC) FILETIME=[2420C000:01C80450]
Status:
RO
Content-Length: 585
Lines: 21

>
> ----- Forwarded message -----
> From: Neulinger, Nathan <nneul@umr.edu>
> Date: Sep 27, 2007 2:58 PM
> Subject: RE: cracklib license
> To: alecm@crypto.dircon.co.uk
>
> Any chance you could write me a self-contained email stating clearly
> that the license is being changed to GPL, so I could include that
> email
> in the repository and clean up the repository/tarballs? I have all the
> original discussion, but something succinct and self contained
> would be
> ideal.

The license for my code in the Cracklib distribution is henceforth GPL.

Happy now? :-)

-a

EFFECTIVE OCT 2008, LICENSE IS BEING CHANGED TO LGPL-2.1 (though not reflected
in released code until Nov 2009 - slow release cycle...)

Discussion thread from mailing list archive, with approval from everyone actively
involved or holding original licensing rights included.

[Cracklib-devel] cracklib license

From: Mike Frysinger <vapier@ge...> - 2007-10-02 01:16

Attachments: Message as HTML

looks like 2.8.11 is out and marked as "GPL-2" ... releasing libraries unde=
r=20

GPL-2 is not desirable at all ... this is why the LGPL-2.1 exists
=2Dmike

Re: [Cracklib-devel] cracklib license

From: Neulinger, Nathan <nneul@um...> - 2007-10-02 01:18

I understand that, and you're welcome to bring it up with Alec directly and see if he wants to relicense his code as LGPL... but at this point, it was enough to just get it consistent and documented as to what it was released under. This wasn't actually a license change, just a clarification of the licensing that was already in place.=20

-- Nathan

=20

Nathan Neulinger EMail: nneul@um...

University of Missouri - Rolla Phone: (573) 341-6679

UMR Information Technology Fax: (573) 341-4216

> -----Original Message-----

> From: cracklib-devel-bounces@li...

> [mailto:cracklib-devel-bounces@li...] On Behalf Of

> Mike Frysinger

> Sent: Monday, October 01, 2007 8:15 PM

> To: cracklib-devel@li...

> Subject: [Cracklib-devel] cracklib license

>=20

> looks like 2.8.11 is out and marked as "GPL-2" ... releasing

> libraries under

> GPL-2 is not desirable at all ... this is why the LGPL-2.1 exists

> -mike

Re: [Cracklib-devel] cracklib license

From: Mike Frysinger <vapier@ge...> - 2007-10-02 01:33

Attachments: Message as HTML

On Monday 01 October 2007, Neulinger, Nathan

wrote:

> I understand that, and you're welcome to bring it up with Alec directly

> and see if he wants to relicense his code as LGPL... but at this point,

> it was enough to just get it consistent and documented as to what it was

> released under. This wasn't actually a license change, just a

> clarification of the licensing that was already in place.

the original license (before moving to sourceforge -- aka, 2.7) was not=20

GPL-2 ... it was a modified artistic license ... i didnt notice the license=

=20

change until it was mentioned in the latest notes.

unlike the old license, GPL-2 prevents people from using cracklib unless th=

eir=20

applications are also GPL-2 which imo is just wrong. it isnt the place of =

a=20

library to dictact to application writes what license they should be using.=

=20

thus LGPL-2.1 enters to fill this void.

=2Dmike

Re: [Cracklib-devel]

cracklib license

From: Neulinger, Nathan <nneul@um...> - 2007-10-02 01:46

Seems like the ideal thing here would be for you and the other distro maintainers to get together with Alec in a conversation and come to a decision as to what licensing scheme y'all want. I haven't really done much other than cleaning up the packaging and patches and a small bit of additional code, so whatever licensing y'all come up with is fine by me.

-- Nathan

=20

Nathan Neulinger EMail: nneul@um...

University of Missouri - Rolla Phone: (573) 341-6679

UMR Information Technology Fax: (573) 341-4216

> -----Original Message-----

> From: cracklib-devel-bounces@li...

> [mailto:cracklib-devel-bounces@li...] On Behalf Of

> Mike Fry singer

> Sent: Monday, October 01, 2007 8:33 PM

> To: Neulinger, Nathan

> Cc: cracklib-devel@li...; Alec Muffett

> Subject: Re: [Cracklib-devel] cracklib license

>=20

> On Monday 01 October 2007, Neulinger, Nathan wrote:

> > I understand that, and you're welcome to bring it up with Alec

> directly

> > and see if he wants to relicense his code as LGPL... but at this

> point,

> > it was enough to just get it consistent and documented as to what

> it was

> > released under. This wasn't actually a license change, just a

> > clarification of the licensing that was already in place.

>=20

> the original license (before moving to sourceforge -- aka, 2.7) was

> not

> GPL-2 ... it was a modified artistic license ... i didnt notice the

> license

> change until it was mentioned in the latest notes.
>=20
> unlike the old license, GPL-2 prevents people from using cracklib
> unless their
> applications are also GPL-2 which imo is just wrong. it isnt the
> place of a
> library
to dictact to application writes what license they should
> be using.
> thus LGPL-2.1 enters to fill this void.
> -mike

Re: [Cracklib-devel] cracklib license

From: Alec Muffett <alecm@cr...> - 2007-10-02 08:57

> Seems like the ideal thing here would be for you and the other distro
> maintainers to get together with Alec in a conversation and come to a
> decision as to what licensing scheme y'all want. I haven't really done
> much other than cleaning up the packaging and patches and a small
> bit of
> additional code, so whatever licensing y'all come up with is fine
> by me.

I am sympathetic. Guys, what do you reckon?

What I am hearing so far is that LGPL makes sense, since it can be
linked with any code, not just GPL...

-a

Re: [Cracklib-devel] cracklib license

From: Devin Reade <gdr@gn...> - 2007-10-02 15:04

I would like to see it under LGPL as well. I

think it is in everyone's

best interests to have as secure systems as possible, and I think tainting
it via GPL will just make it less likely that the library gets used, and
will not usually cause companies/developers to GPL the dependent code
(where it is not already GPL).

I like GPL, I use it when I can, but I don't think that it's the correct
license in this situation.

Devin

--

If it's sinful, it's more fun.

Re: [Cracklib-devel] cracklib license

From: Nalin Dahyabhai <nalin@re...> - 2008-01-28 16:32

On Tue, Oct 02, 2007 at 09:57:31AM +0100, Alec Muffett wrote:

>> Seems like the ideal thing here would be for you and the other distro
>> maintainers to get together with Alec in a conversation and come to a
>> decision as to what licensing scheme y'all want. I haven't really done
>> much other than cleaning up the packaging and patches and a small
>> bit of
>> additional

code, so whatever licensing y'all come up with is fine

>> by me.

>

> I am sympathetic. Guys, what do you reckon?

>

> What I am hearing so far is that LGPL makes sense, since it can be

> linked with any code, not just GPL...

My apologies for not chiming in in anything resembling a reasonable timeframe.

I'd also suggest the LGPL, for the reason you noted above. Alternately, GPLv2 with the option of using the library under a later version of the GPL would permit applications which were released under version 3 of the GPL to use the library, too, which would be sufficient for the packages which are included in Fedora. FWIW, I'd personally lean toward LGPL.

In any case, I thank you both for working on sorting this out.

Cheers,

Nalin

Re: [Cracklib-devel] cracklib license

From: Mike Frysinger <vapier@ge...> - 2008-10-05 21:27

Attachments: Message as HTML

On Monday 28 January 2008, Nalin Dahyabhai wrote:

> On Tue, Oct 02, 2007 at 09:57:31AM +0100, Alec Muffett wrote:

>>> Seems like the ideal thing here would be for you and the other distro
>>> maintainers to get together with Alec in a conversation and come to a
>>> decision as to what licensing scheme y'all want. I haven't really done
>>> much other than cleaning up the packaging and patches and a small
>>> bit of
>>> additional code, so whatever licensing y'all come up with is fine
>>> by me.
>>

>> I am sympathetic. Guys, what do you reckon?
>>
>> What I am hearing so far is that LGPL makes sense, since it can be
>> linked with any code, not just GPL...
>
> My apologies for not chiming in in anything resembling a reasonable
> timeframe.
>
> I'd also suggest the LGPL, for the reason you noted above. Alternately,
> GPLv2 with the option of using
the library under a later version of the
> GPL would permit applications which were released under version 3 of the
> GPL to use the library, too, which would be sufficient for the packages
> which are included in Fedora. FWIW, I'd personally lean toward LGPL.
>
> In any case, I thank you both for working on sorting this out.

looks like everyone is OK with LGPL-2.1 (GNU Lesser license), so can we make
the change now ?

-mike

Re: [Cracklib-devel] cracklib license

From: Alec Muffett <alecm@cr...> - 2008-10-05 23:18

>> In any case, I thank you both for working on sorting this out.

>

> looks like everyone is OK with LGPL-2.1 (GNU Lesser license), so can we make
> the change now ?

yes. go for it. thanks++

-a

Re: [Cracklib-devel] cracklib license

From: Mike Frysinger <vapier@ge...> - 2008-10-25 22:34

Attachments: Message as HTML

On Sunday 05 October

2008, Alec Muffett wrote:

>>> In any case, I thank you both for working on sorting this out.

>>

>> looks like everyone is OK with LGPL-2.1 (GNU Lesser license), so can we
>> make the change now ?

>

> yes. go for it. thanks++

Nathan Neulinger is the only one who can actually make said change ...

-mike

BELOW IS ORIGINAL LICENSING DISCUSSION RE CHANGING TO GPL from Artistic.

CrackLib was originally licensed with a variant of the Artistic license. In the interests of wider acceptance and more modern licensing, it was switched with the original author's blessing to GPL v2.

This approval was carried out in email discussions in 2005, and has been reconfirmed as of 2007-10-01 with the following email from Alec Muffett.

The below email references nneul@umr.edu address, as that is the address that was used at the time. For any future emails regarding this, please use nneul@neulinger.org.

From
alecm@crypticide.com Mon Oct 1 12:26:03 2007
Received: from umr-exproto2.cc.umn.edu ([131.151.0.192]) by UMR-CMAIL1.umn.edu with Microsoft SMTPSVC(6.0.3790.3959);
Mon, 1 Oct 2007 12:26:03 -0500
Received: from scansrv2.srv.mst.edu ([131.151.1.114]) by umr-exproto2.cc.umn.edu with Microsoft SMTPSVC(6.0.3790.3959);
Mon, 1 Oct 2007 12:26:02 -0500
Received: (qmail 8022 invoked from network); 1 Oct 2007 16:59:55 -0000
Received: from smtp1.srv.mst.edu (131.151.1.43)
by scanin-ipvs.cc.umn.edu with SMTP; 1 Oct 2007 16:59:55 -0000
Received: from spunkymail-mx8.g.dreamhost.com (mx1.spunky.mail.dreamhost.com [208.97.132.47])
by smtp1.srv.mst.edu (8.13.1/8.13.1) with ESMTP id I91Gxtpr020623
for <nneul@umr.edu>; Mon, 1 Oct 2007 11:59:55 -0500
Received: from rutherford.zen.co.uk (rutherford.zen.co.uk [212.23.3.142])
by spunkymail-mx8.g.dreamhost.com (Postfix) with ESMTP id 2C7734D311
for <nneul@neulinger.org>; Mon, 1 Oct 2007 09:59:50 -0700 (PDT)
Received: from
[82.68.43.14] (helo=[192.168.1.3])
by rutherford.zen.co.uk with esmtp (Exim 4.50)
id 1IcOcX-0004Qt-6L
for nneul@neulinger.org; Mon, 01 Oct 2007 16:59:49 +0000
Mime-Version: 1.0 (Apple Message framework v752.2)
In-Reply-To: <1b1b3fd80710010908k11dac0afp1f2dd471059ff9a4@mail.gmail.com>
References: <1190922867.3457.147.camel@localhost.localdomain>

<EC90713277D2BE41B7110CCD74E235CEF44F38@UMR-CMAIL1.umr.edu>
<1b1b3fd80710010908k11dac0afp1f2dd471059ff9a4@mail.gmail.com>
Content-Type: text/plain; charset=US-ASCII; delsp=yes; format=flowed
Message-Id: <117A1264-F6DC-4E25-B0DD-56FBFE6E9F@crypticide.com>
Content-Transfer-Encoding: 7bit
From: Alec Muffett <alecm@crypticide.com>
Subject: Re: cracklib license
Date: Mon, 1 Oct 2007 17:59:46 +0100
To: Nathan Neulinger <nneul@neulinger.org>
X-Mailer: Apple Mail (2.752.2)
X-Originating-Rutherford-IP: [82.68.43.14]
Return-Path: alecm@crypticide.com
X-OriginalArrivalTime: 01 Oct 2007 17:26:03.0008 (UTC) FILETIME=[2420C000:01C80450]
Status: RO
Content-Length:
585
Lines: 21

>
> ----- Forwarded message -----
> From: Neulinger, Nathan <nneul@umr.edu>
> Date: Sep 27, 2007 2:58 PM
> Subject: RE: cracklib license
> To: alecm@crypto.dircon.co.uk
>
> Any chance you could write me a self-contained email stating clearly
> that the license is being changed to GPL, so I could include that
> email
> in the repository and clean up the repository/tarballs? I have all the
> original discussion, but something succinct and self contained
> would be
> ideal.

The license for my code in the Cracklib distribution is henceforth GPL.

Happy now? :-)

-a

1.106 sed 4.2.1-10.el6

1.106.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run

modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the

public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for

the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users'

Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid

circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied

by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or

author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or

c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or

d) Limiting the use for publicity purposes of names of licensors or authors of the material; or

e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if

the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner

consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM

IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>
This program comes with
ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

GNU Free Documentation License
Version 1.3, 3 November 2008

Copyright (C) 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.
<http://fsf.org/>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

0. PREAMBLE

The purpose of this License is to make a manual, textbook, or other functional and useful document "free" in the sense of freedom: to

assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of "copyleft", which means that derivative works of the document must themselves be free in the same sense. It complements the GNU General Public License, which is a copyleft license designed for free software.

We

have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

1. APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The "Document", below, refers to any such manual or work. Any member of the public is a licensee, and is addressed as "you". You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A "Modified Version" of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A "Secondary Section" is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The "Invariant Sections" are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not "Transparent" is called "Opaque".

Examples of suitable formats for Transparent copies include plain ASCII without markup, Texinfo input format, LaTeX input format, SGML or XML using a publicly available DTD, and standard-conforming simple HTML, PostScript or PDF designed for human modification. Examples of transparent image formats include PNG, XCF and JPG. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, SGML or XML for which the DTD and/or processing tools are not generally available, and the machine-generated HTML, PostScript or PDF produced by some word processors for output purposes only.

The "Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, "Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The "publisher" means any person or entity that distributes copies of the Document to the public.

A section "Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as "Acknowledgements", "Dedications", "Endorsements", or "History".) To "Preserve the Title" of such a section when you modify the Document means that it remains a section "Entitled XYZ" according to this definition.

The

Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

2. VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

3. COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition. Copying with changes limited to the covers, as long as they preserve

the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

4. MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

- A. Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.
- B. List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five),

- unless they release you from this requirement.
- C. State on the Title page the name of the publisher of the Modified Version, as the publisher.
 - D. Preserve all the copyright notices of the Document.
 - E. Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.
 - F. Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.
 - G. Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.
 - H. Include an unaltered copy of this License.
 - I. Preserve the section Entitled "History", Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled "History" in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.
 - J. Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the "History" section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.
 - K. For any section Entitled "Acknowledgements" or "Dedications", Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.
 - L. Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.
 - M. Delete any section Entitled "Endorsements". Such a section may not be included in the Modified Version.
 - N. Do not retitle any existing section to be Entitled "Endorsements" or to conflict in title with any Invariant Section.
 - O. Preserve any Warranty Disclaimers.

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled "Endorsements", provided it contains nothing but endorsements of your Modified Version by various parties--for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

5. COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled "History" in the various original documents, forming one section Entitled "History"; likewise combine any sections Entitled "Acknowledgements", and any sections Entitled "Dedications". You must delete all sections Entitled "Endorsements".

6. COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

7. AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an "aggregate" if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

8. TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4.

Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the

Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled "Acknowledgements", "Dedications", or "History", the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

9. TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

10. FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See

<http://www.gnu.org/copyleft/>.

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

11. RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

"CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

"Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is "eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

Copyright (c) YEAR YOUR NAME.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled "GNU Free Documentation License".

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the "with...Texts." line with this:

with the Invariant Sections being LIST THEIR TITLES, with the Front-Cover Texts being LIST, and with the Back-Cover Texts being LIST.

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

1.107 gconf 2.28.0-6.el6

1.107.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary

GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is

addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must

itself be a software library.

- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do

this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy

from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or

distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU

FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year>  
<name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter

the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

1.108 acl 2.2.49-6.el6

1.108.1 Available under license :

This package was debianized by Nathan Scott nathans@debian.org on Tue, 26 Feb 2002 13:25:26 +1100

It can be downloaded from <ftp://acl.bestbits.at/>

Copyright:

Copyright (C) 2001 Andreas Gruenbacher.

Copyright (C) 2001-2002 Silicon Graphics, Inc. All Rights Reserved.

You are free to distribute this software under Version 2.1 of the GNU Lesser General Public License.

On Debian systems, refer to `/usr/share/common-licenses/LGPL-2.1` for the complete text of the GNU Lesser General Public License.

Certain components (as annotated in the source) are licensed under the terms of the GNU General Public License.

On Debian systems, the complete text of the GNU General Public License can be found in `/usr/share/common-licenses/GPL` file.

Most components of the "acl" package are licensed under Version 2.1 of the GNU Lesser General Public License (see `COPYING.LGPL`).

Some components (as annotated in the source) are licensed under Version 2 of the GNU General Public License (see below),

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that

any

patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete

machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the

Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation

may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one  
line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if

necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License

does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Lesser General
Public License instead of this License.

Most components of the "acl" package are licensed under
Version 2.1 of the GNU Lesser General Public License (see below).
below.

Some components (as annotated in the source) are licensed
under Version 2 of the GNU General Public License (see COPYING).

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom
to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who decide to use it. You
can use it too, but we suggest you first think carefully about whether
this license or the ordinary General Public License is the better

strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those

libraries
into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License").

Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere

aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the

Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply,

and the section as a whole is intended to apply in other circumstances.

It

is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
Lesser General Public License
for more details.

You should have received a copy of the GNU Lesser General Public
License along with this library; if not, write to the Free Software
Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the library, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the
library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.109 bzip2 1.0.5-7.el6_0

1.109.1 Available under license :

This program, "bzip2", the associated library "libbzip2", and all
documentation, are copyright (C) 1996-2007 Julian R Seward. All
rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.
2. The origin of this software must not be misrepresented; you must
not claim that you wrote the original software. If you use this
software in a product, an acknowledgment in the product
documentation would be appreciated but is not required.

3. Altered source versions must be plainly marked as such, and must not be misrepresented as being the original software.
4. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Julian Seward, jseward@bzip.org
bzip2/libbzip2 version 1.0.5 of 10 December 2007

1.110 libaio 0.3.107-10.el6

1.110.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that

any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order

to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License").

Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into

another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any

medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can

be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of

this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a

work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.
^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a)

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever

changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the

Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot

distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by

the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file

to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.111 net-tools 1.60-110.el6_2

1.111.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we

want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and

distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are

prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING

OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS),
EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program ``Gnomovision'` (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.112 libtool 2.2.6-15.5.el6

1.112.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the

Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a

"work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any

warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the

complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library

creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the

user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2)

will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise

permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.
- b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by

all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these,

write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your

freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein.

You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to

address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest

possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```


<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.113 lua 5.1.4-4.1.el6

1.113.1 Available under license :

Lua License

Lua is licensed under the terms of the MIT license reproduced below. This means that Lua is free software and can be used for both academic and commercial purposes at absolutely no cost.

For details and rationale, see <http://www.lua.org/license.html> .

=====
Copyright (C) 1994-2008 Lua.org, PUC-Rio.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

=====

(end of COPYRIGHT)

1.114 libvorbis 1.2.3-4.e16_2.1

1.114.1 Available under license :

Copyright (c) 2002-2008 Xiph.org Foundation

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- Neither the name of the Xiph.org Foundation nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.115 mtr 0.75-5.e16

1.115.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any

part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be

distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the

original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands

`show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if

necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.116 libedit 2.11-4.20080712cvs.1.el6

1.116.1 Available under license :

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS'' AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.117 libidn 1.18-2.el6

1.117.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling

it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be

allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means

all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has

a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany

it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables

containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit

modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)
- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception,

the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.
- b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time.

Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

@c The GNU Lesser General Public License.

@center Version 2.1, February 1999

@c This file is intended to be included within another document,

@c hence no sectioning command or @node.

@display

Copyright @copyright{ } 1991, 1999 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence the
version number 2.1.]

@end display

@subheading Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software---to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software---typically
libraries---of the Free
Software Foundation and other authors who decide to use it. You can use
it too, but we suggest you first think carefully about whether this
license or the ordinary General Public License is the better strategy to
use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of it
in new free programs; and that you are informed that you can do these
things.

To protect your rights, we need to make restrictions that forbid
distributors to deny you these rights or to ask you to surrender these
rights. These restrictions translate to certain responsibilities for
you if you distribute copies of the library
or if you modify it.

For example, if you distribute copies of the library, whether gratis

or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the @dfn{Lesser} General Public License because it does @emph{Less} to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain

special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a ``work based on the library" and a ``work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

@subheading TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@enumerate 0

@item

This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called ``this License"). Each licensee is addressed as ``you".

A ``library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The ``Library", below, refers to any such software library or work which has been distributed under these terms. A ``work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a

portion of it,
either verbatim or with modifications and/or translated
straightforwardly into another language. (Hereinafter, translation is
included without limitation in the term ``modification".)

``Source code" for a work means the preferred form of the work for
making modifications to it. For a library, complete source code means
all the source code for all modules it contains, plus any associated
interface definition files, plus the scripts used to control compilation
and installation of the library.

Activities other than copying, distribution and modification are not
covered by this License; they are outside its scope. The act of
running a program using the Library is not restricted, and output from
such a program is covered only if its contents constitute a work based
on the Library (independent of the use of the Library in a tool for
writing it). Whether that is true depends on what the Library does
and what the program that uses the Library does.

@item

You may copy and distribute
verbatim copies of the Library's
complete source code as you receive it, in any medium, provided that
you conspicuously and appropriately publish on each copy an
appropriate copyright notice and disclaimer of warranty; keep intact
all the notices that refer to this License and to the absence of any
warranty; and distribute a copy of this License along with the
Library.

You may charge a fee for the physical act of transferring a copy,
and you may at your option offer warranty protection in exchange for a
fee.

@item

You may modify your copy or copies of the Library or any portion
of it, thus forming a work based on the Library, and copy and
distribute such modifications or work under the terms of Section 1
above, provided that you also meet all of these conditions:

@enumerate a

@item

The modified work must itself be a software library.

@item

You must cause the files modified to carry prominent notices
stating that you changed the files and the date of any change.

@item

You must
cause the whole of the work to be licensed at no
charge to all third parties under the terms of this License.

@item

If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

@end enumerate

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

@item

You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so

that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

@item

You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

@item

A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a ``work that uses the Library''. Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a ``work that uses the Library'' with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a ``work that uses the library''. The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a ``work that uses the Library'' uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise,
if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

@item

As an exception to the Sections above, you may also combine or link a ``work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

@enumerate a

@item

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable ``work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

@item

Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the

library already present on the user's computer system, rather than copying library functions into the executable,
and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

@item

Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

@item

If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

@item

Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

@end enumerate

For an executable, the required form of the ``work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

@item

You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

@enumerate a

@item

Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

@item

Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.
@end enumerate

@item

You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

@item

You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

@item

Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

@item

If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License,

they do not
excuse you from the conditions of this License. If you cannot
distribute so as to satisfy simultaneously your obligations under this
License and any other pertinent obligations, then as a consequence you
may not distribute the Library at all. For example, if a patent
license would not permit royalty-free redistribution of the Library by
all those who receive copies directly or indirectly through you, then
the only way you could satisfy both it and this License would be to
refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any
particular circumstance, the balance of the section is intended to apply,
and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any
patents or other property right claims or to contest validity of any
such claims; this section has the sole purpose of protecting the
integrity of the free software
distribution system which is
implemented by public license practices. Many people have made
generous contributions to the wide range of software distributed
through that system in reliance on consistent application of that
system; it is up to the author/donor to decide if he or she is willing
to distribute software through any other system and a licensee cannot
impose that choice.

This section is intended to make thoroughly clear what is believed to
be a consequence of the rest of this License.

@item

If the distribution and/or use of the Library is restricted in
certain countries either by patents or by copyrighted interfaces, the
original copyright holder who places the Library under this License may add
an explicit geographical distribution limitation excluding those countries,
so that distribution is permitted only in or among countries not thus
excluded. In such case, this License incorporates the limitation as if
written in the body of this License.

@item

The Free Software Foundation
may publish revised and/or new
versions of the Lesser General Public License from time to time.
Such new versions will be similar in spirit to the present version,
but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library
specifies a version number of this License which applies to it and
``any later version'', you have the option of following the terms and

conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

@item

If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

@iftex

@heading NO WARRANTY

@end iftex

@ifinfo

@center NO WARRANTY

@end ifinfo

@item

BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY ``AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

@item

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@end enumerate

@iftex
@heading END OF TERMS AND CONDITIONS
@end iftex
@ifinfo
@center END OF TERMS AND CONDITIONS

@end ifinfo

@page
@subheading How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the ``copyright" line and a pointer to where the full notice is found.

@smallexample
@var{one line to give the library's name and an idea of what it does.}
Copyright (C) @var{year} @var{name of author}

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.
@end smallexample

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a ``copyright disclaimer" for the library, if

necessary. Here is a sample; alter the names:

@smallexample

Yoyodyne, Inc., hereby disclaims all copyright interest in the library
'Frob' (a library for tweaking knobs) written by James Random Hacker.

@var{signature of Ty Coon}, 1 April 1990

Ty Coon, President of Vice

@end smallexample

That's all there is to it!

@c The GNU Free Documentation License.

@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,

@c hence no sectioning command or @node.

@display

Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.

@uref{http://fsf.org/}

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other
functional and useful document @dfn{free} in the sense of freedom: to
assure everyone the effective freedom to copy and redistribute it,
with or without modifying it, either commercially or noncommercially.
Secondarily, this License preserves for the author and publisher a way
to get credit for their work, while not being considered responsible
for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative
works of the document

must themselves be free in the same sense. It
complements the GNU General Public License, which is a copyleft
license designed for free software.

We have designed this License in order to use it for manuals for free
software, because free software needs free documentation: a free
program should come with manuals providing the same freedoms that the
software does. But this License is not limited to software manuals;
it can be used for any textual work, regardless of subject matter or

whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The "Document", below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as "you". You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A "Modified Version" of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A "Secondary Section" is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The "Invariant Sections" are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the

general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not ``Transparent" is called ``Opaque".

Examples of suitable formats for Transparent copies include plain `@sc{ascii}` without markup, Texinfo input format, `La@TeX{}` input format, `@acronym{SGML}` or `@acronym{XML}` using a publicly available `@acronym{DTD}`, and standard-conforming simple `@acronym{HTML}`, PostScript or `@acronym{PDF}` designed for human modification. Examples of transparent image formats include `@acronym{PNG}`, `@acronym{XCF}` and `@acronym{JPG}`. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, `@acronym{SGML}` or `@acronym{XML}` for which the `@acronym{DTD}` and/or processing tools are not generally available, and the machine-generated `@acronym{HTML}`, PostScript or `@acronym{PDF}` produced by some word processors for output purposes only.

The ``Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, ``Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The ``publisher" means any person or entity that distributes copies of the Document to the public.

A section ``Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as ``Acknowledgements", ``Dedications", ``Endorsements", or ``History".) To ``Preserve the Title" of such a section when you modify the Document means that it remains a section ``Entitled XYZ" according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this

License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible.

You may add other material on the covers in addition.

Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols

a complete Transparent copy of the Document, free of added material. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that

this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions

(which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications

adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements'' or ``Dedications'', Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements''. Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements" or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document,

you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements", provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History'' in the various original documents, forming one section Entitled ``History''; likewise combine any sections Entitled ``Acknowledgements'', and any sections Entitled ``Dedications''. You must delete all sections Entitled ``Endorsements''.

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an ``aggregate'' if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the

electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See [@uref{http://www.gnu.org/copyleft/}](http://www.gnu.org/copyleft/).

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

"CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

``Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is ``eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

@smallexample

@group

Copyright (C) @var{year} @var{your name}.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled ``GNU Free Documentation License".

@end group

@end smallexample

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the ``with@dots{ }Texts." line with this:

@smallexample

@group

with the Invariant Sections being @var{list their titles}, with the Front-Cover Texts being @var{list}, and with the Back-Cover Texts being @var{list}.

@end group

@end smallexample

If you have Invariant Sections without Cover Texts, or some other

combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

@c Local Variables:

@c ispell-local-pdict: "ispell-dict"

@c End:

License below is copied from <<http://www.unicode.org/copyright.html>>, last updated 7 July 2004, and claims to apply to all Unicode versions.

According to a post on emacs-devel,
<<http://lists.gnu.org/archive/html/emacs-devel/2004-04/msg00036.html>>,
RMS believe it is a free license:

This is a free license, and even compatible with the GPL (if that ever matters). Yes, we can use it now.

EXHIBIT 1

UNICODE, INC. LICENSE AGREEMENT - DATA FILES AND SOFTWARE

Unicode Data Files include all data files under the directories <http://www.unicode.org/Public/> and <http://www.unicode.org/reports/>. Unicode Software includes any source code under the directories <http://www.unicode.org/Public/> and <http://www.unicode.org/reports/>.

NOTICE TO USER: Carefully read the following legal agreement. BY DOWNLOADING, INSTALLING, COPYING OR OTHERWISE USING UNICODE INC.'S DATA FILES ("DATA FILES"), AND/OR SOFTWARE ("SOFTWARE"), YOU UNEQUIVOCALLY ACCEPT, AND AGREE TO BE BOUND BY, ALL OF THE TERMS AND CONDITIONS

OF THIS AGREEMENT. IF YOU DO NOT AGREE, DO NOT DOWNLOAD, INSTALL, COPY, DISTRIBUTE OR USE THE DATA FILES OR SOFTWARE.

COPYRIGHT AND PERMISSION NOTICE

Copyright 1991-2004 Unicode, Inc. All rights reserved. Distributed under the Terms of Use in <http://www.unicode.org/copyright.html>.

Permission is hereby granted, free of charge, to any person obtaining a copy of the Unicode data files and associated documentation (the "Data Files") or Unicode software and associated documentation (the "Software") to deal in the Data Files or Software without restriction, including without limitation the rights to use, copy, modify, merge,

publish, distribute, and/or sell copies of the Data Files or Software, and to permit persons to whom the Data Files or Software are furnished to do so, provided that (a) the above copyright notice(s) and this permission notice appear in all copies of the Data Files or Software, (b) both the above copyright notice(s) and this permission notice appear in associated documentation, and (c) there is clear notice in each modified Data File or in the Software as well as in the documentation associated with the Data File(s) or Software that the data or software has been modified.

THE DATA FILES AND SOFTWARE ARE PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT OF THIRD PARTY RIGHTS. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR HOLDERS INCLUDED IN THIS NOTICE BE LIABLE FOR ANY CLAIM, OR ANY SPECIAL INDIRECT OR CONSEQUENTIAL DAMAGES, OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THE DATA FILES OR SOFTWARE.

Except as contained in this notice, the name of a copyright holder shall not be used in advertising or otherwise to promote the sale, use or other dealings in these Data Files or Software without prior written authorization of the copyright holder.

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

- (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited

permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License,

in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source

as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in

source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under

this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within

the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.
@c The GNU General Public License.
@center Version 3, 29 June 2007

@c This file is intended to be included within another document,
@c hence no sectioning command or @node.

@display
Copyright @copyright{ } 2007 Free Software Foundation, Inc. @url{http://fsf.org/}

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.
@end display

@heading Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program---to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you

want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

@heading TERMS AND CONDITIONS

@enumerate 0

@item Definitions.

``This License" refers to version 3 of the GNU General Public License.

``Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

``The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as ``you". ``Licensees" and ``recipients" may be individuals or organizations.

To ``modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a ``modified version" of the earlier work or a work ``based on" the earlier work.

A ``covered work" means either the unmodified Program or a work based on the Program.

To ``propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To ``convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays ``Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

@item Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

@item Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission

to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

@item Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

@item Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

@item Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

@enumerate a

@item

The work must carry prominent notices stating that you modified it, and giving a relevant date.

@item

The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to ``keep intact all notices".

@item

You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

@item

If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

@end enumerate

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in

or on a volume of a storage or distribution medium, is called an ``aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

@item Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

@enumerate a

@item

Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

@item

Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

@item

Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

@item

Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to

satisfy these requirements.

@item

Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

@end enumerate

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

@item Additional Terms.

``Additional permissions'' are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

@enumerate a

@item

Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or

@item

Requiring preservation of specified reasonable legal notices or author

attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or

@item

Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or

@item

Limiting the use for publicity purposes of names of licensors or authors of the material; or

@item

Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

@item

Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

@end enumerate

All other non-permissive additional terms are considered

``further

restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

@item Termination.

You may not propagate or modify a

covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination

of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

@item Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

@item Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an

organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

@item Patents.

A ``contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's ``contributor version".

A contributor's ``essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, ``control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a ``patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To ``grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone

to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you

must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. ``Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is ``discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

@item No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under

this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

@item Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

@item Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

@item Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM ``AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

@item Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@item Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

@end enumerate

@heading END OF TERMS AND CONDITIONS

@heading How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the ``copyright" line and a pointer to where the full notice is found.

```
@smallexample
@var{one line to give the program's name and a brief idea of what it does.}
Copyright
(C) @var{year} @var{name of author}
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see [@url{http://www.gnu.org/licenses/}](http://www.gnu.org/licenses/).
@end smallexample

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
@smallexample
@var{program} Copyright (C) @var{year} @var{name of author}
This program comes with ABSOLUTELY NO WARRANTY;
for details type @samp{show w}.
This is free software, and you are welcome to redistribute it
under certain conditions; type @samp{show c} for details.
@end smallexample
```

The hypothetical commands `@samp{show w}` and `@samp{show c}` should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an ```about box"`.

You should also get your employer (if you work as a programmer) or school, if any, to sign a ```copyright disclaimer"` for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see [@url{http://www.gnu.org/licenses/}](http://www.gnu.org/licenses/).

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

But

first, please read @url{<http://www.gnu.org/philosophy/why-not-lgpl.html>}.

1.118 libgssglue 0.1-11.el6

1.118.1 Available under license :

This package was debianized by J. Bruce Fields <bfields@fieldses.org> on Thu, 21 Oct 2004 16:54:53 -0400.

The latest version can always be found at <http://www.citi.umich.edu/projects/nfsv4/linux/>

Authors: Kevin Coffman, J. Bruce Fields, et. al.

Includes code copyrighted by the University of Michigan, Sun Microsystems, and MIT; licenses:

Copyright (c) 2004 The Regents of the University of Michigan.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright 1996 by Sun Microsystems, Inc.

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appears in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Sun Microsystems not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Sun Microsystems makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

SUN MICROSYSTEMS DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL SUN MICROSYSTEMS BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright
1995 by the Massachusetts Institute of Technology.
All Rights Reserved.

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of M.I.T. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Furthermore if you modify this software you must label your software as modified software and not distribute it in such a fashion that it might be confused with the original M.I.T. software.
M.I.T.

makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty. libgssapi is copyright 2006 The Regents of the University of Michigan, and based on code from Sun Microsystems and the Massachusetts Institute of Technology; see licenses on individual files (summarized below).

University of Michigan code is copyright 2006, and provided under the following license:

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED
`AS IS" AND ANY EXPRESS OR IMPLIED
WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF
MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE
DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR
CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF
SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR
BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF
LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING
NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS
SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Code from Sun Microsystems is copyright 1996, available under the following license:

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appears in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Sun Microsystems not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Sun Microsystems makes no representations about the suitability of this software for any

purpose. It is provided "as is" without express or implied warranty.

SUN MICROSYSTEMS DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL SUN MICROSYSTEMS BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Code from the Massachusetts Institute of Technology is Copyright 1995, available under the following license:

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of M.I.T. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Furthermore if you modify this software you must label your software as modified software and not distribute it in such a fashion that it might be confused with the original M.I.T. software. M.I.T. makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

1.119 libgpg-error 1.7-4.el6

1.119.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and

modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further

restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will

be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands
`show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who decide
to use it. You
can use it too, but we suggest you first think carefully about whether
this license or the ordinary General Public License is the better
strategy to use in any particular case, based on the explanations
below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of
it in new free programs; and that you are informed that you can do
these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs

(which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify

that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative

work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object

code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in

Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies,

or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that

system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE

LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software

Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301
USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.120 netkit-ftp 0.17

1.120.1 Available under license :

No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 1985 Regents of the University of California.

* All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software

* must display the following acknowledgement:

* This product includes software developed by the University of

* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

* may be used

to endorse or promote products derived from this software

* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND

* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*/

Found in path(s):

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/ruserpass.c
*

/opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/domacro.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 1985, 1989 Regents of the University of California.

* All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software

* must display the following acknowledgement:

* This product includes software developed by the University of

* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

* may

be used to endorse or promote products derived from this software

* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND

* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE

* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS

* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT

* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY

* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF

* SUCH DAMAGE.

*/

Found in path(s):

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/main.c

*

/opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/cmds.c

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/cmdtab.c

No license file was found, but licenses were detected in source scan.

.\" All rights reserved.

.\" Redistribution and use in source and binary forms, with or without

.\" modification, are permitted provided that the following conditions

.\" are met:

.\" 1. Redistributions of source code must retain the above copyright

.\" notice, this list of conditions and the following disclaimer.

.\" 2. Redistributions in binary form must reproduce the above copyright

.\" notice, this list of conditions and the following disclaimer in the

.\" documentation and/or other materials provided with the distribution.

.\" 3. All advertising materials mentioning features or use of this software

.\" 4. Neither the name of the University nor the names of its contributors

.\" without specific prior written permission.

Found in path(s):

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/netrc.5

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/ftp.1

No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 1985, 1989 Regents of the University of California.

* All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software

* must display the following acknowledgement:

* This product includes software developed by the University of

* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

* may

be used to endorse or promote products derived from this software

* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.

*
* from: @(#)ftp_var.h 5.9 (Berkeley) 6/1/90
* \$Id: ftp_var.h,v 1.12 1999/10/02 18:39:17 dholland Exp \$
*/

Found in path(s):

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/ftp_var.h
No license file was found, but licenses were detected in source scan.

/*
* Copyright (c) 1980 Regents of the University of California.
* All rights reserved.
*
* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:
* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
* 3. All advertising materials mentioning features or use of this software
* must display the following acknowledgement:
* This product includes software developed by the University of
* California, Berkeley and its contributors.
* 4. Neither the name of the University nor the names of its contributors
* may be used
to endorse or promote products derived from this software
* without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*/

Found in path(s):

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/glob.c
*

/opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/glob.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 1985, 1989 Regents of the University of California.

* All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software

* must display the following acknowledgement:

* This product includes software developed by the University of

* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

* may

be used to endorse or promote products derived from this software

* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS'' AND

* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE

* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS

* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT

* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY

* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF

* SUCH DAMAGE.

*/

Found in path(s):

* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/ftp.c

No license file was found, but licenses were detected in source scan.

```
/*
* Copyright (c) 1989 The Regents of the University of California.
* All rights reserved.
*
* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:
* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
* 3. All advertising materials mentioning features or use of this software
* must display the following acknowledgement:
* This product includes software developed by the University of
* California, Berkeley and its contributors.
* 4. Neither the name of the University nor the names of its contributors
* may be
used to endorse or promote products derived from this software
* without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*
* from: @(#)pathnames.h 5.2 (Berkeley) 6/1/90
* $Id: pathnames.h,v 1.1 1996/07/13 23:46:07 dholland Exp $
*/
```

Found in path(s):

```
* /opt/cola/permits/1633532305_1681719645.6079297/0/netkit-ftp-0-17-orig-tar-gz/netkit-ftp-0.17/ftp/pathnames.h
```

1.121 sqlite 3.6.20-1.el6

1.121.1 Available under license :

No license file was found, but licenses were detected in source scan.

<copyright.html>>public domain. No claim of ownership is made

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-

MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/faq.html

No license file was found, but licenses were detected in source scan.

<html>

<head>

<title>SQLite Consortium Agreement</title>

</head>

<body bgcolor="white">

<h1 align="center">

SQLite Consortium Agreement

</h1>

<p>This SQLite Consortium Agreement ("Agreement") is made and entered into as of the ____ day of _____, 2007 ("Effective Date") by and between _____ (the "Company"), and Hipp, Wyrick & Company, Inc., a Georgia Corporation with headquarters at 6200 Maple Cove Lane, Charlotte, NC ("Hwaci").</p>

<p>WHEREAS, Hwaci is the developer of a serverless, embeddable, public domain SQL database engine available at <http://www.sqlite.org/> ("SQLite"); and</p>

<p>WHEREAS, Company wishes to support the independent development of the SQLite database engine to insure the continuing reliability, vitality, and independence of SQLite, and in connection therewith, Company wishes to provide funds for ongoing research, development, and maintenance of the SQLite code base, operation of the SQLite website, protection and maintenance of the SQLite trademark, as well as for promotion of SQLite at conferences and trade shows; and</p>

<p>WHEREAS, Company wishes to receive benefits in the form of services from Hwaci in consideration for their support of SQLite; and

<p>WHEREAS, Company and Hwaci each wish SQLite to be supported and maintained as an independent, community-driven project, and to ensure the SQLite development team remains independent.</p>

<p>NOW, THEREFORE, in consideration of the mutual promises contained

herein, the parties agree as follows:</p>

<h2>1.0 Definitions</h2>

<h3>1.1 SQLite Developers</h3>

<p>The "SQLite Developers" are the employees or contractors of Hwaci engaged in the development of SQLite, including without limitation the SQLite Architect.</p>

<h3>1.2 SQLite Architect</h3>

<p>The "SQLite Architect" is the SQLite Developer with ultimate responsibility and authority over changes and maintenance of the SQLite code. The current SQLite Architect is the original designer and developer of SQLite, D. Richard Hipp. Hwaci may change the SQLite Architect from time to time upon approval by Company.</p>

<h3>1.3 Consortium Member</h3>

<p>A "Consortium Member" is a company or organization, including but not limited to Company, which has entered into an agreement with Hwaci which is substantially similar to this Agreement.</p></p>

<h2>2.0 Agreement</h2>

<h3>2.1 Responsibilities And Obligations Of SQLite Developers</h3>

<h4>2.1.1 General Support</h4>

<p>The SQLite Developers shall provide, without limit, timely and accurate answers, advice, and instruction in response to questions and comments from Company about SQLite submitted by email or by telephone at any time day or night.</p></p>

<h4>2.1.2 Debugging Support</h4>

The SQLite Developers shall at Company's request provide Company with direct assistance in debugging applications that are built upon or use SQLite. The combined time for Debugging Support and Custom Development for Company is limited to 330 hours per year.</p></p>

<h4>2.1.3 Custom Development</h4>

<p>The SQLite Developers shall at the request of Company write new extensions or enhancements to SQLite according to Company's specifications. These extensions and enhancements may be proprietary to Company or open source or

with the consent of both Company and the SQLite Architect may be folded into the public domain SQLite source tree.
The time devoted to Custom Development for Company is limited 220 hours per year.

<h4>2.1.4 Custom Builds</h4>

The SQLite Developers shall at Company's request provide Company with specialized builds of SQLite according to Company's specifications.

<h4>2.1.5 Legacy Support</h4>

The SQLite Developers shall at Company's request provide support and bug-fix patches for any historical version of SQLite.

<h4>2.1.6 Custom Testing</h4>

The SQLite Developers shall at Company's request set up and run acceptance tests according Company's specifications that are specifically designed to exercise SQLite as configured and used by Company. These acceptance tests shall be run and shall pass prior to any release of SQLite.

<h4>2.1.7 Priority Bug Fixes</h4>

The SQLite Developers shall assign highest priority to fixing bugs in SQLite that are reported by Company or in which Company has expressed a specific interest.

<h4>2.1.8 Code Quality</h4>

The SQLite Developers shall at all times keep the SQLite source code well commented and documented and clearly structured and organized so that an experienced and competent programmer can understand it and support it after no more than a few months of study.

<h4>2.1.9 Backwards Compatibility</h4>

The SQLite Developers recognize that Company uses SQLite in mission-critical applications and therefore shall work diligently to ensure continuing bug-free correct operation and backwards compatibility with prior releases.

<h4>2.1.10 Test Coverage</h4>

The SQLite Developers shall maintain the SQLite test suite such

that no less than 95% source code coverage is provided.

</p>

<h4>2.1.11 Website</h4>

<p>The SQLite Developers shall maintain the SQLite website at http://www.sqlite.org in good working order and all SQLite source code shall be made freely available at such website.

</p>

<h3>2.2 Responsibilities And Obligations Of The SQLite Architect</h3>

<h4>2.2.1 Private Briefings</h4>

<p>The SQLite Architect shall, at the request of Company, provide Company with private notification and briefings of any new bugs or new features in SQLite that might effect Company's products.

</p>

<h4>2.2.2 Direction</h4>

<p>The SQLite Architect shall coordinate the activities of SQLite Developers and shall publish from time to time a roadmap of proposed future changes and enhancements to SQLite.

</p>

<h4>2.2.3 Oversight</h4>

<p>The SQLite Architect shall personally review all changes to the SQLite Source Code and take responsibility for the quality and correctness of those changes.

</p>

<h4>2.2.4 Continuity</h4>

<p>The initial SQLite Architect shall be the original developer of SQLite, D. Richard Hipp. The role of SQLite Architect shall not be assigned to another during the term of this Agreement except due to the disability of Dr. Hipp and with approval of Company.

</p>

<h3>2.3 Responsibilities And Obligations Of Hwaci</h3>

<h4>2.3.1 Employer</h4>

<p>Hwaci shall act as the employer of the SQLite Developers and SQLite Architect and shall make all tax and legal filings and tax withholding required by employers. Hwaci shall provide Company with W-9 information upon request.

</p>

<h4>2.3.2 Responsible Party</h4>

<p>All obligations of the SQLite Developers set forth in this agreement are deemed obligations of Hwaci. Hwaci shall recruit, employ, and supervise SQLite Developers in such a way that the responsibilities and obligations of the SQLite Developers set forth in this agreement are upheld.</p>

<h4>2.3.3 Multiple Developers</h4>

<p>Hwaci shall recruit and employ as many SQLite Developers for as many hours as can be reasonably achieved using the funds received from Consortium Members under this agreement. So that support for SQLite will not be interrupted by the disability or withdrawal of any one SQLite Developer, Hwaci will keep at least two knowledgeable and competent SQLite Developers on staff.</p>

<h4>2.3.4 Mentorship</h4>

<p>Hwaci shall work to encourage independent programmers from around the world to become familiar with SQLite internals so that there will be a pool of talent able to support SQLite in the future.</p>

<h4>2.3.5 Audits</h4>

<p>Hwaci shall keep and maintain complete and accurate records of the use of development funds provided by Company and shall allow Company, or its representative, a certified public accountant mutually acceptable to Hwaci and Company, during office hours and at reasonable intervals, no more than once every 12 months, to inspect and make extracts or copies of such records solely for the purpose of ascertaining Hwaci's compliance with the objectives and requirements of this agreement.</p>

<h4>2.3.6 Disaster Planning</h4>

<p>Hwaci shall maintain backup copies of all SQLite source files and documentation, current and historical, at at least two separate locations separated from each other and from the primary on-line SQLite repository by at least 400 kilometers.</p>

<h4>2.3.7 Trademark</h4>

<p>Hwaci shall maintain ownership of the SQLite trademark and the sqlite.org domain name and shall purchase bandwidth and

server space for the <http://www.sqlite.org/> website.

2.3.8 No Take-overs or Buy-outs

Neither Hwaci nor the SQLite Architect shall relinquish development control of SQLite during the term of this Agreement, by acquisition or merger or by any other means, except with the consent of Company.

2.3.9

New Consortium Members

New Consortium Members may be accepted into the consortium from time to time under identical terms as this agreement, or under substantially similar terms that have been approved by existing Consortium Members.

2.3.10 Adequate Staff

Hwaci shall recruit and employ a sufficient number of qualified SQLite Developers to easily cover all custom development, debugging, and general support service obligations for all Consortium Members while still providing ample time for the SQLite Developers to engage in general maintenance and extension of SQLite.

2.3.11 Use Of Funds

Hwaci shall use the funds provided hereunder solely for the development and maintenance of SQLite as set forth in this Agreement. Interest on funds received in advance and held in trust will be reinvested and used for the same purposes as the principal.

2.4 Responsibilities And Obligations Of Company

2.4.1 Funding

Company shall provide funding for the ongoing support and maintenance of SQLite as set forth in section 3.0 "Fees".

2.4.2 Copyright Disclaimer

Company acknowledges that SQLite source code and documentation published on the [SQLite website](http://www.sqlite.org/) is in the public domain and that nothing in this agreement shall change that fact.

</p>

<h2>3.0 Fees</h2>

<p>In consideration of the performance by Hwaci, the SQLite Developers, and the SQLite Architect of the obligations described herein, Company shall pay Hwaci at least US \$75,000 per year in advance either annually, quarterly, or monthly, at Company's discretion.</p>

<h2>4.0 Confidentiality</h2>

<h3>4.1 Definition of Confidential Information</h3>

<p>"Confidential Information" means any Company proprietary information, technical data, trade secrets or know-how, including, but not limited to, research, product plans, products, services, customers, customer lists, markets, software, developments, inventions, processes, formulas, technology, designs, drawings, engineering, hardware configuration information, marketing, finances or other business information disclosed by Company either directly or indirectly in writing, orally or by drawings or inspection of parts or equipment.</p>

<h3>4.2 Non-Use and Non-Disclosure.</h3>

<p>Hwaci shall not, during or subsequent to the term of this Agreement, use Company's Confidential Information for any purpose whatsoever other than the performance of the Services or disclose Company's Confidential Information to any third party. The parties acknowledge that Confidential Information will remain the sole property of Company. Hwaci shall take all reasonable precautions to prevent any unauthorized disclosure of Confidential Information including, but not limited to, having each employee or consultant of Hwaci, if any, with access to any Confidential Information, execute a nondisclosure agreement containing provisions in Company's favor substantially similar to this Agreement. Confidential Information does not include information that: (i) is known to Hwaci at the time of disclosure to Hwaci by Company as evidenced by written records of Hwaci; (ii) has become publicly known and made generally available through no wrongful act of Hwaci; or (iii) has been received by Hwaci from a third party who is authorized to make such disclosure.</p>

<h4>4.2.1 Disclosure Required by Law</h4>

In the event any Confidential Information is required to be disclosed

by Hwaci under the terms of a valid and effective subpoena or order issued by a court of competent jurisdiction, or by a demand or information request from an executive or administrative agency or other governmental authority, Hwaci shall, unless prohibited by the terms of a subpoena, order, or demand, promptly notify Company of the existence, terms and circumstances surrounding such demand or request, shall consult with Company on the advisability of

taking legally available steps to resist or narrow such demand or request, and, if disclosure of such Confidential Information is required, shall exercise its reasonable best efforts to narrow the scope of disclosure and obtain an order or other reliable assurance that confidential treatment will be accorded to such Confidential Information. To the extent that Hwaci is prohibited from notifying Company of a subpoena, order or demand, by the terms of same, Hwaci shall exercise its reasonable efforts to narrow the scope of disclosure.

4.3 Return of Materials.

Upon the termination of this Agreement, or upon Company's earlier request, Hwaci shall deliver to Company all of Company's property or Confidential Information that Hwaci may have in Hwaci's possession or control.

5.0 Intellectual Property

5.1 No Assignment

Company acknowledges that all copyrightable material, notes, records, drawings, designs, inventions, improvements, developments,

discoveries and trade secrets made, generated, conceived, or reduced to practice by Hwaci related to SQLite will remain the property of Hwaci. Nothing in this Agreement will be construed to transfer any intellectual property right of Hwaci to Company.

5.2 Availability and Public Domain Dedication

The SQLite Developers and Hwaci shall, subject to their discretion as to the quality and suitability of the SQLite source code and documentation for public release, make the SQLite source code and documentation publicly available as downloadable files and make a public statement ceding all intellectual

property rights, including but not limited to copyright and patent rights, in the SQLite source code and documentation to the public domain.

To the extent that the SQLite Developers and Hwaci elect not to release the SQLite source code and documentation publicly, they shall provide copies thereof to Company and hereby grants to Company, under all of the SQLite

Developers' and Hwaci's rights

including but not limited to copyright and patent rights, in and to the SQLite source code and documentation, perpetual, irrevocable, worldwide, non-exclusive, sublicenseable license to use, copy, prepare derivative works of, publicly perform and display the SQLite source code and documentation and derivative works thereof.</p>

<h3>5.3 Trademark</h3>

<p>Hwaci shall use the name "SQLite" only to apply to the publicly available project known by such name as of the Effective Date. Hwaci may in its discretion file such trademark applications or registrations as it deems appropriate to protect or record its rights therein, and may set such policies as it deems appropriate for licensing the use of the trademark.</p>

<h2>6.0 Representations And Warranties</h2>

<h3>6.1 Intellectual Property Clearances.</h3>

<p>Hwaci hereby represents and warrants that Hwaci shall enter into agreements with the SQLite Developers sufficient to enable Hwaci to undertake the obligations of Section 5.</p>

<h3>6.2 Disclaimer.</h3>

<p>THE WORK PRODUCT AND ALL MATERIAL PROVIDED BY HWACI AND COMPANY ARE PROVIDED "AS IS." NEITHER PARTY MAKES ANY REPRESENTATIONS OR WARRANTIES OF ANY KIND, WHETHER ORAL OR WRITTEN, WHETHER EXPRESS, IMPLIED, OR ARISING BY STATUTE, CUSTOM, COURSE OF DEALING OR TRADE USAGE, WITH RESPECT TO THE SUBJECT MATTER HEREOF, IN CONNECTION WITH THIS AGREEMENT. EACH PARTY SPECIFICALLY DISCLAIMS ANY AND ALL IMPLIED WARRANTIES OR CONDITIONS OF TITLE, MERCHANTABILITY,

FITNESS FOR A PARTICULAR PURPOSE, AND NON-INFRINGEMENT.</p>

<h2>7.0 Term And Termination</h2>

<h3>7.1 Term.</h3>

<p>This Agreement will commence on the Effective Date and will continue until 12 months after the Effective Date. Thereafter, the parties may by mutual consent renew this Agreement subject to agreement on fees to be paid by Company for sponsorship for additional periods.</p>

<h3>7.2 Termination.</h3>

<p>If either party materially defaults in the performance of any of its material obligations hereunder and if any such default is not corrected within 30 days after notice in writing, then the non-defaulting party, at its option, may, in addition to any other remedies it may have, thereupon terminate this Agreement by giving written notice of termination to the defaulting party.</p>

<h3>7.3 Survival.</h3>

<p>Upon such termination all rights and duties of the parties toward each other will cease except: Sections 4 (Confidentiality), 5 (Intellectual Property), and 8 (Miscellaneous) will survive termination of this Agreement.</p>

<h2>8. Miscellaneous</h2>

<h3>8.1 Nonassignment/Binding Agreement.</h3>

<p>The parties acknowledge that the unique nature of Hwaci's services are substantial consideration for the parties' entering into this Agreement. Neither this Agreement nor any rights under this Agreement may be assigned or otherwise transferred by Hwaci, in whole or in part, whether voluntarily or by operation of law, without the prior written consent of Company, which consent will not be unreasonably withheld. Subject to the foregoing, this Agreement will be binding upon and will inure to the benefit of the parties and their respective successors and assigns. Any assignment in violation of the foregoing will be null and void.</p>

8.2 Notices.

Any notice required or permitted under the terms of this Agreement or required by law must be in writing and must be: (a) delivered in person; (b) sent by first class registered mail, or air mail, as appropriate; or (c) sent by overnight air courier, in each case properly posted and fully prepaid to the appropriate address set forth in the preamble to this Agreement. Either party may change its address for notice by notice to the other party given in accordance with this Section. Notices will be considered to have been given at the time of actual delivery in person, three business days after deposit in the mail as set forth above, or one day after delivery to an overnight air courier service.

8.3 Waiver.

Any waiver of the provisions of this Agreement or of a party's rights or remedies under this Agreement must be in writing to be effective. Failure, neglect, or delay by a party to enforce the provisions of this Agreement or its rights or remedies at any time, will not be construed as a waiver of such party's rights under this Agreement and will not in any way affect the validity of the whole or any part of this Agreement or prejudice such party's right to take subsequent action. No exercise or enforcement by either party of any right or remedy under this Agreement will preclude the enforcement by such party of any other right or remedy under this Agreement or that such party is entitled by law to enforce.

8.4 Severability.

If any term, condition, or provision in this Agreement is found to be invalid, unlawful or unenforceable to any extent, the parties shall endeavor in good faith to agree to such amendments that will preserve, as far as possible, the intentions expressed in this Agreement. If the parties fail to agree on such an amendment, such invalid term, condition or provision will be severed from the remaining terms, conditions and provisions, which will continue to be valid and enforceable to the fullest extent permitted by law.

8.5 Integration.

This Agreement contains the entire agreement of the parties with respect to the subject matter of this Agreement and supersedes all previous communications, representations, understandings and agreements, either oral or written, between the parties with respect to said subject matter. This Agreement may not be amended, except by a writing signed by both parties.

8.6 Counterparts.

This Agreement may be executed in counterparts, each of which so executed will be deemed to be an original and such counterparts together will constitute one and the same agreement.

8.7 Governing Law.

This Agreement will be interpreted and construed in accordance with the laws of the State of North Carolina and the United States of America, without regard to conflict of law principles. All disputes arising out of this Agreement will be subject to the exclusive jurisdiction of the state and federal courts located in North Carolina, and each party hereby consents to the personal jurisdiction thereof.

8.8 Independent Contractors.

It is the intention of the parties that Hwaci is an independent contractor. Nothing in this Agreement will in any way be construed to constitute Hwaci or any of its employees as an agent, employee or representative of Company.

9.0 Signatures

The parties have executed this Agreement below to indicate their acceptance of its terms.

HWACI By: Print Name:

```

<p>&nbsp;</p>
Title:<hr>
<p>&nbsp;</p>
</td><td
width="10%"></td>
<td valign="top">
COMPANY<br>
By:<hr>
<p>&nbsp;</p>
Print Name:<hr>
<p>&nbsp;</p>
Title:<hr>
<p>&nbsp;</p>
</td></tr></table>

```

Found in path(s):

```

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/consortium_agreement-
20071201.html

```

No license file was found, but licenses were detected in source scan.

```
# 2001 September 15
```

```
#
```

```
# The author disclaims copyright to this source code. In place of
```

```
# a legal notice, here is a blessing:
```

```
#
```

```
# May you do good and not evil.
```

```
# May you find forgiveness for yourself and forgive others.
```

```
# May you share freely, never taking more than you give.
```

```
#
```

```
*****
```

```
# This file implements regression tests for SQLite library. The
```

```
# focus of this file is testing built-in functions.
```

```
#
```

```
set testdir [file dirname $argv0]
```

```
source $testdir/tester.tcl
```

```
# Create a table to work with.
```

```
#
```

```
do_test func-0.0 {
```

```
execsql {CREATE TABLE tb1(t1 text)}
```

```
foreach word {this program is free software} {
```

```
    execsql "INSERT INTO tb1 VALUES('$word')"
```

```
}
```

```
execsql {SELECT t1 FROM tb1 ORDER BY t1}
```

```
} {free is program software this}
```

```
do_test func-0.1 {
```

```

execsql {
  CREATE TABLE t2(a);
  INSERT INTO t2 VALUES(1);
  INSERT INTO t2 VALUES(NULL);
  INSERT INTO t2 VALUES(345);
  INSERT INTO t2 VALUES(NULL);
  INSERT INTO t2 VALUES(67890);
  SELECT * FROM t2;
}
} {1 {} 345 {} 67890}

# Check out the length() function
#
do_test func-1.0 {
  execsql {SELECT length(t1) FROM tbl1 ORDER BY t1}
} {4 2 7 8 4}
do_test func-1.1 {
  set r [catch {execsql {SELECT length(*) FROM tbl1 ORDER BY t1}} msg]
  lappend r $msg
} {1 {wrong number of arguments to function length()}}
do_test func-1.2 {
  set r [catch {execsql {SELECT length(t1,5) FROM tbl1 ORDER BY t1}} msg]
  lappend r $msg
} {1 {wrong number of arguments to function length()}}
do_test func-1.3 {
  execsql {SELECT length(t1), count(*) FROM tbl1 GROUP BY length(t1)
          ORDER BY length(t1)}
} {2 1 4 2 7 1 8 1}
do_test func-1.4 {
  execsql {SELECT coalesce(length(a),-1) FROM t2}
} {1 -1 3 -1 5}

# Check out the substr() function
#
do_test func-2.0 {
  execsql {SELECT substr(t1,1,2) FROM tbl1 ORDER BY t1}
} {fr is pr so th}
do_test func-2.1 {
  execsql {SELECT substr(t1,2,1)
          FROM tbl1 ORDER BY t1}
} {r s r o h}
do_test func-2.2 {
  execsql {SELECT substr(t1,3,3) FROM tbl1 ORDER BY t1}
} {ee {} ogr ftw is}
do_test func-2.3 {
  execsql {SELECT substr(t1,-1,1) FROM tbl1 ORDER BY t1}
} {e s m e s}
do_test func-2.4 {

```

```

execsql {SELECT substr(t1,-1,2) FROM tbl1 ORDER BY t1}
} {e s m e s}
do_test func-2.5 {
execsql {SELECT substr(t1,-2,1) FROM tbl1 ORDER BY t1}
} {e i a r i}
do_test func-2.6 {
execsql {SELECT substr(t1,-2,2) FROM tbl1 ORDER BY t1}
} {ee is am re is}
do_test func-2.7 {
execsql {SELECT substr(t1,-4,2) FROM tbl1 ORDER BY t1}
} {fr {} gr wa th}
do_test func-2.8 {
execsql {SELECT t1 FROM tbl1 ORDER BY substr(t1,2,20)}
} {this software free program is}
do_test func-2.9 {
execsql {SELECT substr(a,1,1) FROM t2}
} {1 {} 3 {} 6}
do_test func-2.10 {
execsql {SELECT substr(a,2,2) FROM t2}
} {{{} {} 45 {} 78}

# Only do the following tests if TCL has UTF-8 capabilities
#
if {"\u1234"!="u1234"} {

# Put some UTF-8 characters in the database
#
do_test
func-3.0 {
execsql {DELETE FROM tbl1}
foreach word "contains UTF-8 characters hi\u1234ho" {
execsql "INSERT INTO tbl1 VALUES('$word')"
}
execsql {SELECT t1 FROM tbl1 ORDER BY t1}
} "UTF-8 characters contains hi\u1234ho"
do_test func-3.1 {
execsql {SELECT length(t1) FROM tbl1 ORDER BY t1}
} {5 10 8 5}
do_test func-3.2 {
execsql {SELECT substr(t1,1,2) FROM tbl1 ORDER BY t1}
} {UT ch co hi}
do_test func-3.3 {
execsql {SELECT substr(t1,1,3) FROM tbl1 ORDER BY t1}
} "UTF cha con hi\u1234"
do_test func-3.4 {
execsql {SELECT substr(t1,2,2) FROM tbl1 ORDER BY t1}
} "TF ha on i\u1234"
do_test func-3.5 {

```

```

execsql {SELECT substr(t1,2,3) FROM tbl1 ORDER BY t1}
} "TF- har ont i\u1234h"
do_test func-3.6 {
execsql {SELECT substr(t1,3,2) FROM tbl1 ORDER BY t1}
} "F- ar nt \u1234h"
do_test func-3.7 {
execsql {SELECT substr(t1,4,2) FROM tbl1 ORDER BY t1}
} "-8 ra ta ho"
do_test func-3.8 {
execsql {SELECT substr(t1,-1,1) FROM tbl1 ORDER BY t1}
} "8 s s o"
do_test
func-3.9 {
execsql {SELECT substr(t1,-3,2) FROM tbl1 ORDER BY t1}
} "F- er in \u1234h"
do_test func-3.10 {
execsql {SELECT substr(t1,-4,3) FROM tbl1 ORDER BY t1}
} "TF- ter ain i\u1234h"
do_test func-3.99 {
execsql {DELETE FROM tbl1}
foreach word {this program is free software} {
execsql "INSERT INTO tbl1 VALUES('$word')"
}
execsql {SELECT t1 FROM tbl1}
} {this program is free software}

} ;# End \u1234!=u1234

# Test the abs() and round() functions.
#
ifcapable !floatingpoint {
do_test func-4.1 {
execsql {
CREATE TABLE t1(a,b,c);
INSERT INTO t1 VALUES(1,2,3);
INSERT INTO t1 VALUES(2,12345678901234,-1234567890);
INSERT INTO t1 VALUES(3,-2,-5);
}
catchsql {SELECT abs(a,b) FROM t1}
} {1 {wrong number of arguments to function abs()}}
}
ifcapable floatingpoint {
do_test func-4.1 {
execsql {
CREATE TABLE t1(a,b,c);
INSERT INTO t1 VALUES(1,2,3);
INSERT INTO t1 VALUES(2,1.2345678901234,-12345.67890);
INSERT

```



```

INTO t1 VALUES(3,-2,-5);
}
catchsql {SELECT abs(a,b) FROM t1}
} {1 {wrong number of arguments to function abs()}}
}
do_test func-4.2 {
catchsql {SELECT abs() FROM t1}
} {1 {wrong number of arguments to function abs()}}
ifcapable floatingpoint {
do_test func-4.3 {
catchsql {SELECT abs(b) FROM t1 ORDER BY a}
} {0 {2 1.2345678901234 2}}
do_test func-4.4 {
catchsql {SELECT abs(c) FROM t1 ORDER BY a}
} {0 {3 12345.6789 5}}
}
ifcapable !floatingpoint {
if {[working_64bit_int]} {
do_test func-4.3 {
catchsql {SELECT abs(b) FROM t1 ORDER BY a}
} {0 {2 12345678901234 2}}
}
do_test func-4.4 {
catchsql {SELECT abs(c) FROM t1 ORDER BY a}
} {0 {3 1234567890 5}}
}
do_test func-4.4.1 {
execsql {SELECT abs(a) FROM t2}
} {1 {} 345 {} 67890}
do_test func-4.4.2 {
execsql {SELECT abs(t1) FROM tbl1}
} {0.0 0.0 0.0 0.0 0.0}

ifcapable floatingpoint {
do_test func-4.5 {
catchsql {SELECT round(a,b,c) FROM t1}
} {1 {wrong number of arguments to function
round()}}
do_test func-4.6 {
catchsql {SELECT round(b,2) FROM t1 ORDER BY b}
} {0 {-2.0 1.23 2.0}}
do_test func-4.7 {
catchsql {SELECT round(b,0) FROM t1 ORDER BY a}
} {0 {2.0 1.0 -2.0}}
do_test func-4.8 {
catchsql {SELECT round(c) FROM t1 ORDER BY a}
} {0 {3.0 -12346.0 -5.0}}
do_test func-4.9 {

```

```

    catchsql {SELECT round(c,a) FROM t1 ORDER BY a}
} {0 {3.0 -12345.68 -5.0}}
do_test func-4.10 {
    catchsql {SELECT 'x' || round(c,a) || 'y' FROM t1 ORDER BY a}
} {0 {x3.0y x-12345.68y x-5.0y}}
do_test func-4.11 {
    catchsql {SELECT round() FROM t1 ORDER BY a}
} {1 {wrong number of arguments to function round()}}
do_test func-4.12 {
    execsql {SELECT coalesce(round(a,2),'nil') FROM t2}
} {1.0 nil 345.0 nil 67890.0}
do_test func-4.13 {
    execsql {SELECT round(t1,2) FROM tb1}
} {0.0 0.0 0.0 0.0 0.0}
do_test func-4.14 {
    execsql {SELECT typeof(round(5.1,1));}
} {real}
do_test func-4.15 {
    execsql {SELECT typeof(round(5.1));}
} {real}
do_test func-4.16 {
    catchsql {SELECT round(b,2.0) FROM t1 ORDER BY b}
} {0 {-2.0 1.23 2.0}}
}

```

Test the upper() and lower() functions

#

```

do_test func-5.1 {
    execsql {SELECT upper(t1) FROM tb1}
} {THIS PROGRAM IS FREE SOFTWARE}
do_test func-5.2 {
    execsql {SELECT lower(upper(t1)) FROM tb1}
} {this program is free software}
do_test func-5.3 {
    execsql {SELECT upper(a), lower(a) FROM t2}
} {1 1 {} {} 345 345 {} {} 67890 67890}
ifcapable !icu {
    do_test func-5.4 {
        catchsql {SELECT upper(a,5) FROM t2}
    } {1 {wrong number of arguments to function upper()}}
}
do_test func-5.5 {
    catchsql {SELECT upper(*) FROM t2}
} {1 {wrong number of arguments to function upper()}}

```

Test the coalesce() and nullif() functions

#

```

do_test func-6.1 {

```

```

execsql {SELECT coalesce(a,'xyz') FROM t2}
} {1 xyz 345 xyz 67890}
do_test func-6.2 {
  execsql {SELECT coalesce(upper(a),'nil') FROM t2}
} {1 nil 345 nil 67890}
do_test func-6.3 {
  execsql {SELECT coalesce(nullif(1,1),'nil')}
}
{nil}
do_test func-6.4 {
  execsql {SELECT coalesce(nullif(1,2),'nil')}
} {1}
do_test func-6.5 {
  execsql {SELECT coalesce(nullif(1,NULL),'nil')}
} {1}

# Test the last_insert_rowid() function
#
do_test func-7.1 {
  execsql {SELECT last_insert_rowid()}
} [db last_insert_rowid]

# Tests for aggregate functions and how they handle NULLs.
#
ifcapable floatingpoint {
  do_test func-8.1 {
    ifcapable explain {
      execsql {EXPLAIN SELECT sum(a) FROM t2;}
    }
    execsql {
      SELECT sum(a), count(a), round(avg(a),2), min(a), max(a), count(*) FROM t2;
    }
  } {68236 3 22745.33 1 67890 5}
}
ifcapable !floatingpoint {
  do_test func-8.1 {
    ifcapable explain {
      execsql {EXPLAIN SELECT sum(a) FROM t2;}
    }
    execsql {
      SELECT sum(a), count(a), avg(a), min(a), max(a), count(*) FROM t2;
    }
  } {68236 3 22745.0 1 67890 5}
}
do_test func-8.2 {
  execsql {
    SELECT max('z+'||a||'abcdefghijklmnopqrstuvwxyzaBCDEFGHIJKLMNOP') FROM t2;
  }
}

```

```

}
} {z+67890abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ}

ifcapable
tempdb {
do_test func-8.3 {
  execsql {
    CREATE TEMP TABLE t3 AS SELECT a FROM t2 ORDER BY a DESC;
    SELECT min('z+'||a||'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ') FROM t3;
  }
} {z+1abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ}
} else {
do_test func-8.3 {
  execsql {
    CREATE TABLE t3 AS SELECT a FROM t2 ORDER BY a DESC;
    SELECT min('z+'||a||'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ') FROM t3;
  }
} {z+1abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ}
}
do_test func-8.4 {
  execsql {
    SELECT max('z+'||a||'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ') FROM t3;
  }
} {z+67890abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ}
ifcapable compound {
do_test func-8.5 {
  execsql {
    SELECT sum(x) FROM (SELECT '9223372036' || '854775807' AS x
      UNION ALL SELECT -9223372036854775807)
  }
} {0}
do_test func-8.6 {
  execsql {
    SELECT typeof(sum(x)) FROM (SELECT '9223372036' || '854775807' AS
x
      UNION ALL SELECT -9223372036854775807)
  }
} {integer}
do_test func-8.7 {
  execsql {
    SELECT typeof(sum(x)) FROM (SELECT '9223372036' || '854775808' AS x
      UNION ALL SELECT -9223372036854775807)
  }
} {real}
ifcapable floatingpoint {
do_test func-8.8 {
  execsql {
    SELECT sum(x)>0.0 FROM (SELECT '9223372036' || '854775808' AS x

```

```

        UNION ALL SELECT -922337203685000000)
    }
} {1}
}
ifcapable !floatingpoint {
do_test func-8.8 {
    execsql {
        SELECT sum(x)>0 FROM (SELECT '9223372036' || '854775808' AS x
            UNION ALL SELECT -922337203685000000)
    }
} {1}
}
}

```

How do you test the random() function in a meaningful, deterministic way?

#

```

do_test func-9.1 {
    execsql {
        SELECT random() is not null;
    }
} {1}
do_test func-9.2 {
    execsql {
        SELECT typeof(random());
    }
} {integer}
do_test func-9.3 {
    execsql {
        SELECT randblob(32) is not null;
    }
} {1}
do_test func-9.4 {
    execsql {
        SELECT typeof(randblob(32));
    }
} {blob}
do_test func-9.5 {
    execsql {
        SELECT length(randblob(32)), length(randblob(-5)),
            length(randblob(2000))
    }
} {32 1 2000}

```

The "hex()" function was added in order to be able to render blobs
generated by randblob(). So this seems like a good place to test
hex().

#

```

ifcapable bloblit {

```

```

do_test func-9.10 {
    execsql {SELECT hex(x'00112233445566778899aAbBcCdDeEfF')}
} {00112233445566778899AABBCCDDEEFF}
}
set encoding [db one {PRAGMA encoding}]
if {$encoding=="UTF-16le"} {
do_test func-9.11-utf16le {
    execsql {SELECT hex(replace('abcdefg','ef','12'))}
} {6100620063006400310032006700}
do_test func-9.12-utf16le {
    execsql {SELECT hex(replace('abcdefg','','12'))}
} {6100620063006400650066006700}
do_test func-9.13-utf16le {
    execsql {SELECT hex(replace('abcdefg','a','aaa'))}
} {61006100610061006100620063006400650066006700}
} elseif {$encoding=="UTF-8"}
{
do_test func-9.11-utf8 {
    execsql {SELECT hex(replace('abcdefg','ef','12'))}
} {61626364313267}
do_test func-9.12-utf8 {
    execsql {SELECT hex(replace('abcdefg','','12'))}
} {61626364656667}
do_test func-9.13-utf8 {
    execsql {SELECT hex(replace('abcdefg','a','aaa'))}
} {616161616161626364656667}
}

# Use the "sqlite_register_test_function" TCL command which is part of
# the text fixture in order to verify correct operation of some of
# the user-defined SQL function APIs that are not used by the built-in
# functions.
#
set ::DB [sqlite3_connection_pointer db]
sqlite_register_test_function $::DB testfunc
do_test func-10.1 {
catchsql {
    SELECT testfunc(NULL,NULL);
}
} {1 {first argument should be one of: int int64 string double null value}}
do_test func-10.2 {
execsql {
    SELECT testfunc(
        'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
        'int', 1234
    );
}
} {1234}

```

```

do_test func-10.3 {
    execsql {
        SELECT testfunc(
            'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
            'string', NULL
        );
    }
} {}

```

```

ifcapable floatingpoint {
    do_test func-10.4 {
        execsql {
            SELECT testfunc(
                'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
                'double', 1.234
            );
        }
    } {1.234}
}

```

```

do_test func-10.5 {
    execsql {
        SELECT testfunc(
            'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
            'int', 1234,
            'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
            'string', NULL,
            'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
            'double', 1.234,
            'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
            'int', 1234,
            'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
            'string', NULL,
            'string', 'abcdefghijklmnopqrstuvwxyABCDEFGHIJKLMNOPQRSTUVWXYZ',
            'double', 1.234
        );
    }
} {1.234}
}

```

```

# Test the built-in
sqlite_version(*) SQL function.
#

```

```

do_test func-11.1 {
    execsql {
        SELECT sqlite_version(*)
    }
} [sqlite3 -version]

```

```

# Test that destructors passed to sqlite3 by calls to sqlite3_result_text()

```

```

# etc. are called. These tests use two special user-defined functions
# (implemented in func.c) only available in test builds.
#
# Function test_destructor() takes one argument and returns a copy of the
# text form of that argument. A destructor is associated with the return
# value. Function test_destructor_count() returns the number of outstanding
# destructor calls for values returned by test_destructor().
#
if {[db eval {PRAGMA encoding}]==="UTF-8"} {
do_test func-12.1-utf8 {
    execsql {
        SELECT test_destructor('hello world'), test_destructor_count();
    }
} {{hello world} 1}
} else {
    ifcapable {utf16} {
do_test func-12.1-utf16 {
    execsql {
        SELECT test_destructor16('hello world'), test_destructor_count();
    }
} {{hello world} 1}
}
}
do_test
func-12.2 {
    execsql {
        SELECT test_destructor_count();
    }
} {0}
do_test func-12.3 {
    execsql {
        SELECT test_destructor('hello')||' world'
    }
} {{hello world}}
do_test func-12.4 {
    execsql {
        SELECT test_destructor_count();
    }
} {0}
do_test func-12.5 {
    execsql {
        CREATE TABLE t4(x);
        INSERT INTO t4 VALUES(test_destructor('hello'));
        INSERT INTO t4 VALUES(test_destructor('world'));
        SELECT min(test_destructor(x)), max(test_destructor(x)) FROM t4;
    }
} {hello world}
do_test func-12.6 {

```



```

execsql {
  SELECT test_destructor_count();
}
} {0}
do_test func-12.7 {
  execsql {
    DROP TABLE t4;
  }
} {}

```

Test that the auxdata API for scalar functions works. This test uses
a special user-defined function only available in test builds,
test_auxdata(). Function test_auxdata() takes any number of arguments.

```

do_test func-13.1 {
  execsql {
    SELECT test_auxdata('hello world');
  }
} {0}

do_test func-13.2 {
  execsql {
    CREATE TABLE t4(a, b);
    INSERT INTO t4 VALUES('abc', 'def');
    INSERT INTO t4 VALUES('ghi', 'jkl');
  }
} {}

do_test func-13.3 {
  execsql {
    SELECT test_auxdata('hello world') FROM t4;
  }
} {0 1}

do_test func-13.4 {
  execsql {
    SELECT test_auxdata('hello world', 123) FROM t4;
  }
} {{0 0} {1 1}}

do_test func-13.5 {
  execsql {
    SELECT test_auxdata('hello world', a) FROM t4;
  }
} {{0 0} {1 0}}

do_test func-13.6 {
  execsql {
    SELECT test_auxdata('hello' || 'world', a) FROM t4;
  }
} {{0 0} {1 0}}

```

```

# Test that auxiliary data is preserved between calls for SQL variables.
do_test func-13.7 {
    set DB [sqlite3_connection_pointer db]
    set sql "SELECT test_auxdata( ?, a ) FROM t4;"
    set STMT [sqlite3_prepare $DB $sql -1 TAIL]
    sqlite3_bind_text $STMT 1 hello\000 -1
    set res [list]
    while { "SQLITE_ROW"==[sqlite3_step $STMT] } {
        lappend res [sqlite3_column_text $STMT 0]
    }
    lappend res [sqlite3_finalize $STMT]
} {{0 0} {1 0} SQLITE_OK}

# Make sure that a function with a very long name
# is rejected
do_test func-14.1 {
    catch {
        db function [string repeat X 254] {return "hello"}
    } {0}
} {0}
do_test func-14.2 {
    catch {
        db function [string repeat X 256] {return "hello"}
    } {1}
} {1}

do_test func-15.1 {
    catchsql {select test_error(NULL)}
} {1 {}}
do_test func-15.2 {
    catchsql {select test_error('this is the error message')}
} {1 {this is the error message}}
do_test func-15.3 {
    catchsql {select test_error('this is the error message',12)}
} {1 {this is the error message}}
do_test func-15.4 {
    db errorcode
} {12}

# Test the quote function for BLOB and NULL values.
do_test func-16.1 {
    execsql {
        CREATE TABLE tbl2(a, b);
    }
    set STMT [sqlite3_prepare $::DB "INSERT INTO tbl2 VALUES(?, ?)" -1 TAIL]
    sqlite3_bind_blob $::STMT 1 abc 3
    sqlite3_step $::STMT
    sqlite3_finalize $::STMT
}

```

```

execsql {
  SELECT quote(a), quote(b) FROM tbl2;
}
} {X'616263' NULL}

# Correctly handle function error messages that include %. Ticket #1354
#
do_test func-17.1 {
  proc
  testfunc1 args {error "Error %d with %s percents %p"}
  db function testfunc1 ::testfunc1
  catchsql {
    SELECT testfunc1(1,2,3);
  }
} {1 {Error %d with %s percents %p}}

# The SUM function should return integer results when all inputs are integer.
#
do_test func-18.1 {
  execsql {
    CREATE TABLE t5(x);
    INSERT INTO t5 VALUES(1);
    INSERT INTO t5 VALUES(-99);
    INSERT INTO t5 VALUES(10000);
    SELECT sum(x) FROM t5;
  }
} {9902}
ifcapable floatingpoint {
  do_test func-18.2 {
    execsql {
      INSERT INTO t5 VALUES(0.0);
      SELECT sum(x) FROM t5;
    }
  } {9902.0}
}

# The sum of nothing is NULL. But the sum of all NULLs is NULL.
#
# The TOTAL of nothing is 0.0.
#
do_test func-18.3 {
  execsql {
    DELETE FROM t5;
    SELECT sum(x), total(x) FROM t5;
  }
} {{} 0.0}
do_test func-18.4 {
  execsql {

```

```

INSERT INTO t5 VALUES(NULL);
SELECT sum(x), total(x) FROM t5
}
} {} 0.0}
do_test func-18.5 {
execsql {
INSERT INTO t5 VALUES(NULL);
SELECT sum(x), total(x)
FROM t5
}
} {} 0.0}
do_test func-18.6 {
execsql {
INSERT INTO t5 VALUES(123);
SELECT sum(x), total(x) FROM t5
}
} {123 123.0}

```

Ticket #1664, #1669, #1670, #1674: An integer overflow on SUM causes
an error. The non-standard TOTAL() function continues to give a helpful
result.

```

#
do_test func-18.10 {
execsql {
CREATE TABLE t6(x INTEGER);
INSERT INTO t6 VALUES(1);
INSERT INTO t6 VALUES(1<<62);
SELECT sum(x) - ((1<<62)+1) from t6;
}
} 0
do_test func-18.11 {
execsql {
SELECT typeof(sum(x)) FROM t6
}
} integer
ifcapable floatingpoint {
do_test func-18.12 {
catchsql {
INSERT INTO t6 VALUES(1<<62);
SELECT sum(x) - ((1<<62)*2.0+1) from t6;
}
} {1 {integer overflow}}
do_test func-18.13 {
execsql {
SELECT total(x) - ((1<<62)*2.0+1) FROM t6
}
} 0.0
}

```

```

ifcapable !floatingpoint {
do_test func-18.12 {
catchsql {
INSERT INTO t6 VALUES(1<<62);
SELECT sum(x) - ((1<<62)*2+1) from t6;
}
} {1 {integer overflow}}
do_test func-18.13 {
execsql {
SELECT total(x) - ((1<<62)*2+1) FROM t6
}
} 0.0
}
if {[working_64bit_int]} {
do_test func-18.14 {
execsql {
SELECT sum(-9223372036854775805);
}
} -9223372036854775805
}
ifcapable compound&&subquery {

do_test func-18.15 {
catchsql {
SELECT sum(x) FROM
(SELECT 9223372036854775807 AS x UNION ALL
SELECT 10 AS x);
}
} {1 {integer overflow}}
if {[working_64bit_int]} {
do_test func-18.16 {
catchsql {
SELECT sum(x) FROM
(SELECT 9223372036854775807 AS x UNION ALL
SELECT -10 AS x);
}
} {0 9223372036854775797}
do_test func-18.17 {
catchsql {
SELECT sum(x) FROM
(SELECT -9223372036854775807 AS x UNION ALL
SELECT 10 AS x);
}
} {0 -9223372036854775797}
}
do_test func-18.18 {
catchsql {
SELECT sum(x) FROM

```

```

        (SELECT -9223372036854775807 AS x UNION ALL
        SELECT -10 AS x);
    }
} {1 {integer overflow}}
do_test
func-18.19 {
catchsql {
    SELECT sum(x) FROM (SELECT 9 AS x UNION ALL SELECT -10 AS x);
}
} {0 -1}
do_test func-18.20 {
catchsql {
    SELECT sum(x) FROM (SELECT -9 AS x UNION ALL SELECT 10 AS x);
}
} {0 1}
do_test func-18.21 {
catchsql {
    SELECT sum(x) FROM (SELECT -10 AS x UNION ALL SELECT 9 AS x);
}
} {0 -1}
do_test func-18.22 {
catchsql {
    SELECT sum(x) FROM (SELECT 10 AS x UNION ALL SELECT -9 AS x);
}
} {0 1}

} ;# ifcapable compound&&subquery

# Integer overflow on abs()
#
if {[working_64bit_int]} {
do_test func-18.31 {
catchsql {
    SELECT abs(-9223372036854775807);
}
} {0 9223372036854775807}
}
do_test func-18.32 {
catchsql {
    SELECT abs(-9223372036854775807-1);
}
} {1 {integer overflow}}

# The MATCH function exists but is only a stub and always throws an error.
#
do_test func-19.1 {
execsql {
    SELECT match(a,b) FROM t1 WHERE 0;
}
}

```

```

}
} {}
do_test func-19.2 {
catchsql {
    SELECT 'abc' MATCH 'xyz';
}
} {1 {unable
to use function MATCH in the requested context}}
do_test func-19.3 {
catchsql {
    SELECT 'abc' NOT MATCH 'xyz';
}
} {1 {unable to use function MATCH in the requested context}}
do_test func-19.4 {
catchsql {
    SELECT match(1,2,3);
}
} {1 {wrong number of arguments to function match()}}

# Soundex tests.
#
if {[catch {db eval {SELECT soundex('hello')}}]} {
set i 0
foreach {name sdx} {
    euler    E460
    EULER    E460
    Euler    E460
    ellery   E460
    gauss    G200
    ghosh    G200
    hilbert  H416
    Heilbronn H416
    knuth    K530
    kant     K530
    Lloyd    L300
    LADD     L300
    Lukasiewicz L222
    Lissajous L222
    A        A000
    12345    ?000
} {
incr i
do_test func-20.$i {
    execsql {SELECT soundex($name)}
} $sdx
}
}

```

```

# Tests of the REPLACE function.
#
do_test func-21.1 {
catchsql {
    SELECT replace(1,2);
}
} {1 {wrong number of arguments to function replace()}}
do_test
func-21.2 {
catchsql {
    SELECT replace(1,2,3,4);
}
} {1 {wrong number of arguments to function replace()}}
do_test func-21.3 {
execsql {
    SELECT typeof(replace("This is the main test string", NULL, "ALT"));
}
} {null}
do_test func-21.4 {
execsql {
    SELECT typeof(replace(NULL, "main", "ALT"));
}
} {null}
do_test func-21.5 {
execsql {
    SELECT typeof(replace("This is the main test string", "main", NULL));
}
} {null}
do_test func-21.6 {
execsql {
    SELECT replace("This is the main test string", "main", "ALT");
}
} {{This is the ALT test string}}
do_test func-21.7 {
execsql {
    SELECT replace("This is the main test string", "main", "larger-main");
}
} {{This is the larger-main test string}}
do_test func-21.8 {
execsql {
    SELECT replace("aaaaaa", "a", "0123456789");
}
} {0123456789012345678901234567890123456789012345678901234567890123456789}

ifcapable tclvar {
do_test func-21.9 {
    # Attempt to exploit a buffer-overflow that

```



```

at one time existed
# in the REPLACE function.
set ::str "[string repeat A 29998]CC[string repeat A 35537]"
set ::rep [string repeat B 65536]
execsql {
  SELECT LENGTH(REPLACE($::str, 'C', $::rep));
}
} [expr 29998 + 2*65536 + 35537]
}

```

Tests for the TRIM, LTRIM and RTRIM functions.

#

```

do_test func-22.1 {
  catchsql {SELECT trim(1,2,3)}
} {1 {wrong number of arguments to function trim()}}
do_test func-22.2 {
  catchsql {SELECT ltrim(1,2,3)}
} {1 {wrong number of arguments to function ltrim()}}
do_test func-22.3 {
  catchsql {SELECT rtrim(1,2,3)}
} {1 {wrong number of arguments to function rtrim()}}
do_test func-22.4 {
  execsql {SELECT trim(' hi ');}
} {hi}
do_test func-22.5 {
  execsql {SELECT ltrim(' hi ');}
} {{hi }}
do_test func-22.6 {
  execsql {SELECT rtrim(' hi ');}
} {{ hi}}
do_test func-22.7 {
  execsql {SELECT trim(' hi ','xyz');}
} {{ hi }}
do_test func-22.8 {
  execsql {SELECT ltrim(' hi ','xyz');}
} {{ hi }}
do_test func-22.9 {
  {
  execsql {SELECT rtrim(' hi ','xyz');}
} {{ hi }}
do_test func-22.10 {
  execsql {SELECT trim('xyxzy hi zzy','xyz');}
} {{ hi }}
do_test func-22.11 {
  execsql {SELECT ltrim('xyxzy hi zzy','xyz');}
} {{ hi zzy}}
do_test func-22.12 {
  execsql {SELECT rtrim('xyxzy hi zzy','xyz');}
}

```

```

} {{xyxzy hi }}
do_test func-22.13 {
  execsql {SELECT trim(' hi ');}
} {{ hi }}
if {[db one {PRAGMA encoding}]=="UTF-8"} {
  do_test func-22.14 {
    execsql {SELECT hex(trim(x'c280e1bfbff48fbfbf6869',x'6162e1bfbfc280'))}
  } {F48FBFBF6869}
  do_test func-22.15 {
    execsql {SELECT hex(trim(x'6869c280e1bfbff48fbfbf61',
      x'6162e1bfbfc280f48fbfbf'))}
  } {6869}
  do_test func-22.16 {
    execsql {SELECT hex(trim(x'ceb1ceb2ceb3',x'ceb1'));}
  } {CEB2CEB3}
}
do_test func-22.20 {
  execsql {SELECT typeof(trim(NULL));}
} {null}
do_test func-22.21 {
  execsql {SELECT typeof(trim(NULL,'xyz'));}
} {null}
do_test func-22.22 {
  execsql {SELECT typeof(trim('hello',NULL));}
}
{null}

# This is to test the deprecated sqlite3_aggregate_count() API.
#
ifcapable deprecated {
  do_test func-23.1 {
    sqlite3_create_aggregate db
    execsql {
      SELECT legacy_count() FROM t6;
    }
  } {3}
}

# The group_concat() function.
#
do_test func-24.1 {
  execsql {
    SELECT group_concat(t1) FROM tbl1
  }
} {this,program,is,free,software}
do_test func-24.2 {
  execsql {
    SELECT group_concat(t1,'') FROM tbl1
  }
}

```

```

}
} {{this program is free software}}
do_test func-24.3 {
execsql {
    SELECT group_concat(t1,' ' || rowid || ' ') FROM tbl1
}
} {{this 2 program 3 is 4 free 5 software}}
do_test func-24.4 {
execsql {
    SELECT group_concat(NULL,t1) FROM tbl1
}
} {{}}
do_test func-24.5 {
execsql {
    SELECT group_concat(t1,NULL) FROM tbl1
}
} {thisprogramisfreesoftware}
do_test func-24.6 {
execsql {
    SELECT 'BEGIN-'||group_concat(t1) FROM tbl1
}
} {BEGIN-this,program,is,free,software}

# Ticket #3179: Make sure aggregate functions can take
many arguments.
# None of the built-in aggregates do this, so use the md5sum() from the
# test extensions.
#
unset -nocomplain midargs
set midargs {}
unset -nocomplain midres
set midres {}
unset -nocomplain result
for {set i 1} {$i<[sqlite3_limit db SQLITE_LIMIT_FUNCTION_ARG -1]} {incr i} {
append midargs './$i'
append midres /$i
set result [md5 \
    "this${midres}program${midres}is${midres}free${midres}software${midres}"]
set sql "SELECT md5sum(t1$midargs) FROM tbl1"
do_test func-24.7.$i {
    db eval $::sql
} $result
}

# Ticket #3806. If the initial string in a group_concat is an empty
# string, the separator that follows should still be present.
#
do_test func-24.8 {

```

```

execsql {
  SELECT group_concat(CASE t1 WHEN 'this' THEN " ELSE t1 END) FROM tbl1
}
} {,program,is,free,software}
do_test func-24.9 {
  execsql {
    SELECT group_concat(CASE WHEN t1!='software' THEN " ELSE t1 END) FROM tbl1
  }
} {,,,,software}

# Ticket #3923. Initial empty strings have a
# separator. But initial
# NULLs do not.
#
do_test func-24.10 {
  execsql {
    SELECT group_concat(CASE t1 WHEN 'this' THEN null ELSE t1 END) FROM tbl1
  }
} {program,is,free,software}
do_test func-24.11 {
  execsql {
    SELECT group_concat(CASE WHEN t1!='software' THEN null ELSE t1 END) FROM tbl1
  }
} {software}
do_test func-24.12 {
  execsql {
    SELECT group_concat(CASE t1 WHEN 'this' THEN "
                          WHEN 'program' THEN null ELSE t1 END) FROM tbl1
  }
} {,is,free,software}

# Use the test_isolation function to make sure that type conversions
# on function arguments do not effect subsequent arguments.
#
do_test func-25.1 {
  execsql {SELECT test_isolation(t1,t1) FROM tbl1}
} {this program is free software}

# Try to misuse the sqlite3_create_function() interface. Verify that
# errors are returned.
#
do_test func-26.1 {
  abuse_create_function db
} {}

# The previous test (func-26.1) registered a function with a very long
# function name that takes many arguments

```


MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/test/func.test

No license file was found, but licenses were detected in source scan.

[Public Domain](http://en.wikipedia.org/wiki/Public_Domain)

[public domain](http://en.wikipedia.org/wiki/Public_Domain)

the public domain and originals of

author, and all of those authors have public domain dedications

Even though SQLite is in the public domain and does not require

the public domain.

their contributions to the public domain.

in this code to the public domain. We make this dedication for the benefit

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-

MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/copyright.html

No license file was found, but licenses were detected in source scan.

Proprietary SQLite Extensions

[public domain](copyright.html). But there also exist

proprietary, licensed extensions to SQLite, written and maintained

You are welcomed to use SQLite in closed source, proprietary, and/or

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-

MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/support.html

No license file was found, but licenses were detected in source scan.

without a shared lock, other processes are free to modify the database

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-

MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/atomiccommit.html

No license file was found, but licenses were detected in source scan.

application code is free to use these routines as well, if desired.

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-

MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/34to35.html

No license file was found, but licenses were detected in source scan.

2006 October 1

#

The author disclaims copyright to this source code. In place of

a legal notice, here is a blessing:

#

May you do good and not evil.

May you find forgiveness for yourself and forgive others.

```

# May you share freely, never taking more than you give.
#
#*****
# This file implements regression tests for SQLite library. The
# focus of this script is testing the FTS1 module, and in particular
# the Porter stemmer.
#
# $Id: fts1porter.test,v 1.5 2006/10/03 19:37:37 drh Exp $
#

```

```

set testdir [file dirname $argv0]
source $testdir/tester.tcl

```

```

# If SQLITE_ENABLE_FTS1 is defined, omit this file.
ifcapable !fts1 {
  finish_test
  return
}

```

```

# Test data for the Porter stemmer. The first word of each line
# is the input. The second word is the desired output.
#
# This test data is taken from http://www.tartarus.org/martin/PorterStemmer/
#

```

```

There is no claim of copyright made on that page, but you should
# probably contact the author (Martin Porter - the inventor of the
# Porter Stemmer algorithm) if you want to use this test data in a
# commercial product of some kind. The stemmer code in FTS1 is a
# complete rewrite from scratch based on the algorithm specification
# and does not contain any code under copyright.
#

```

```

set porter_test_data {
  a          a
  aaron      aaron
  abaissiez  abaissiez
  abandon    abandon
  abandoned  abandon
  abase      abas
  abash      abash
  abate      abat
  abated     abat
  abatement  abat
  abatements abat
  abates     abat
  abbess     abbess
  abbey      abbei
  abbeys     abbei
  abbominable  abbomin

```


abbot	abbot
abbots	abbot
abbreviated	
abbrevi	
abed	ab
abel	abel
aberga	aberga
abergavenny	abergavenni
abet	abet
abetting	abet
abhominable	abhomin
abhor	abhor
abhorr	abhorr
abhorred	abhor
abhorring	abhor
abhors	abhor
abhorson	abhorson
abide	abid
abides	abid
abilities	abil
ability	abil
abject	abject
abjectly	abjectli
abjects	abject
abjur	abjur
abjure	abjur
able	abl
abler	abler
aboard	aboard
abode	abod
aboded	abod
abodements	abod
aboding	abod
abominable	abomin
abominably	abomin
abominations	
abomin	
abortive	abort
abortives	abort
abound	abound
abounding	abound
about	about
above	abov
abr	abr
abraham	abraham
abram	abram
abreast	abreast
abridg	abridg

abridge	abridg
abridged	abridg
abridgment	abridg
abroach	abroach
abroad	abroad
abrogate	abrog
abrook	abrook
abrupt	abrupt
abruption	abrupt
abruptly	abruptli
absence	absenc
absent	absent
absey	absei
absolute	absolut
absolutely	absolut
absolv	absolv
absolver	absolv
abstains	abstain
abstemious	abstemi
abstinence	abstin
abstract	abstract
absurd	absurd
absyrtus	absyrtu
abundance	abund
abundant	abund
abundantly	abundantli
abus	abu
abuse	abus
abused	abus
abuser	abus
abuses	abus
abusing	abus
abutting	abut
aby	abi
abysm	abysm
ac	ac
academe	academ
academes	academ
accent	accent
accents	accent
accept	accept
acceptable	accept
acceptance	accept
accepted	accept
accepts	accept
access	access
accessary	accessari
accessible	access

accidence	accid
accident	accid
accidental	accident
accidentally	
accident	
accidents	accid
accite	accit
accited	accit
accites	accit
acclamations	acclam
accommodate	accommod
accommodated	accommod
accommodation	accommod
accommodations	accommod
accommodo	accommodo
accompanied	acompani
accompany	acompani
accompanying	acompani
accomplices	accomplic
accomplish	accomplish
accomplished	accomplish
accomplishing	accomplish
accomplishment	accomplish
acompt	acompt
accord	accord
accordant	accord
accorded	accord
accordeth	accordeth
according	accord
accordingly	accordingli
accords	accord
accost	accost
accosted	accost
account	account
accountant	
account	
accounted	account
accounts	account
accoutred	accoutr
accoutrement	accoutr
accoutrements	accoutr
accrue	accru
accumulate	accumul
accumulated	accumul
accumulation	accumul
accurs	accur
accursed	accurs
accurst	accurst

accus	accu
accusation	accus
accusations	accus
accusative	accus
accusativo	accusativo
accuse	accus
accused	accus
accuser	accus
accusers	accus
accuses	accus
accuseth	accuseth
accusing	accus
accustom	accustom
accustomed	accustom
ace	ac
acerb	acerb
ache	ach
acheron	acheron
aches	
ach	
achiev	achiev
achieve	achiev
achieved	achiev
achievement	achiev
achievements	achiev
achiever	achiev
achieves	achiev
achieving	achiev
achilles	achil
aching	ach
achitophel	achitophel
acknowledg	acknowledg
acknowledge	acknowledg
acknowledged	acknowledg
acknowledgment	acknowledg
acknown	acknown
acold	acold
aconitum	aconitum
acordo	acordo
acorn	acorn
acquaint	acquaint
acquaintance	acquaint
acquainted	acquaint
acquaints	acquaint
acquir	acquir
acquire	acquir
acquisition	acquisit
acquit	acquit

acquittance	acquitt
acquittances	acquitt
acquitted	
acquit	
acre	acr
acres	acr
across	across
act	act
actaeon	actaeon
acted	act
acting	act
action	action
actions	action
actium	actium
active	activ
actively	activ
activity	activ
actor	actor
actors	actor
acts	act
actual	actual
acture	actur
acute	acut
acutely	acut
ad	ad
adage	adag
adallas	adalla
adam	adam
adamant	adam
add	add
added	ad
adder	adder
adders	adder
addeth	addeth
addict	addict
addicted	addict
addiction	addict
adding	ad
addition	addit
additions	addit
addle	addl
address	address
addressing	address
addrest	addrest
adds	add
adhere	adher
adheres	adher
adieu	adieu

adieux	adieu
adjacent	adjac
adjoin	adjoin
adjoining	adjoin
adjourn	adjourn
adjudg	adjudg
adjudged	adjudg
adjunct	adjunct
administer	administ
administration	administr
admir	admir
admirable	admir
admiral	admir
admiration	admir
admire	admir
admired	admir
admirer	admir
admiring	admir
admiringly	admiringli
admission	
admiss	
admit	admit
admits	admit
admittance	admitt
admitted	admit
admitting	admit
admonish	admonish
admonishing	admonish
admonishment	admonish
admonishments	admonish
admonition	admonit
ado	ado
adonis	adoni
adopt	adopt
adopted	adopt
adoptedly	adoptedli
adoption	adopt
adoptious	adopti
adopts	adopt
ador	ador
adoration	ador
adorations	ador
adore	ador
adorer	ador
adores	ador
adorest	adorest
adoreth	adoreth
adoring	ador

adorn	adorn
adorned	adorn
adornings	adorn
adornment	adorn
adorns	
adorn	
adown	adown
adramadio	adramadio
adrian	adrian
adriana	adriana
adriano	adriano
adriatic	adriatic
adsum	adsum
adulation	adul
adulterate	adulter
adulterates	adulter
adulterers	adulter
adulteress	adulteress
adulteries	adulteri
adulterous	adulter
adultery	adulteri
adultress	adultress
advanc	advanc
advance	advanc
advanced	advanc
advancement	advanc
advancements	advanc
advances	advanc
advancing	advanc
advantage	advantag
advantageable	advantag
advantaged	advantag
advantageous	advantag
advantages	advantag
advantaging	advantag
advent	
advent	
adventur	adventur
adventure	adventur
adventures	adventur
adventuring	adventur
adventurous	adventur
adventurously	adventur
adversaries	adversari
adversary	adversari
adverse	advers
adversely	advers
adversities	advers

adversity	advers
advertis	adverti
advertise	advertis
advertised	advertis
advertisement	advertis
advertising	advertis
advice	advic
advis	advi
advise	advis
advised	advis
advisedly	advisedli
advises	advis
advisings	advis
advocate	advoc
advocation	advoc
aeacida	aeacida
aeacides	aeacid
aedile	aedil
aediles	aedil
aegeon	
	aegeon
aegion	aegion
aegles	aegl
aemelia	aemelia
aemilia	aemilia
aemilius	aemiliu
aeneas	aenea
aeolus	aeolu
aer	aer
aerial	aerial
aery	aeri
aesculapius	aesculapiu
aeson	aeson
aesop	aesop
aetna	aetna
afar	afar
afear	afear
afeard	afeard
affability	affabl
affable	affabl
affair	affair
affaire	affair
affairs	affair
affect	affect
affectation	affect
affectations	affect
affected	affect
affectedly	affectedli

affecteth	affecteth
affecting	affect
affection	affect
affectionate	
affection	
affectionately	affection
affections	affect
affects	affect
affeer	affeer
affienc	affienc
affiance	affienc
affianced	affienc
affied	affi
affin	affin
affined	affin
affinity	affin
affirm	affirm
affirmation	affirm
affirmatives	affirm
afflict	afflict
afflicted	afflict
affliction	afflict
afflictions	afflict
afflicts	afflict
afford	afford
affordeth	affordeth
affords	afford
affray	affrai
affright	affright
affrighted	affright
affrights	affright
affront	affront
affronted	affront
affy	affi
afield	afield
afire	
afir	
afloat	afloat
afoot	afoot
afore	afor
aforehand	aforehand
aforesaid	aforesaid
afraid	afraid
afresh	afresh
afric	afric
africa	africa
african	african
afront	afront

after	after
afternoon	afternoon
afterward	afterward
afterwards	afterward
ag	ag
again	again
against	against
agamemmon	agamemmon
agamemnon	agamemnon
agate	agat
agaz	agaz
age	ag
aged	ag
agenor	agenor
agent	agent
agents	agent
ages	ag
aggravate	aggrav
aggrief	aggrief
agile	
agil	
agincourt	agincourt
agitation	agit
aglet	aglet
agnize	agniz
ago	ago
agone	agon
agony	agoni
agree	agre
agreed	agre
agreeing	agre
agreement	agreement
agrees	agre
agrippa	agrippa
aground	aground
ague	agu
aguecheek	aguecheek
agued	agu
agueface	aguefac
agues	agu
ah	ah
aha	aha
ahungry	ahungri
ai	ai
aialvolio	aialvolio
aiaria	aiaria
aid	aid
aidance	aidanc

aidant	aidant
aided	aid
aiding	aid
aidless	aidless
aids	aid
ail	ail
aim	aim
aimed	aim
aimest	aimest
aiming	aim
aims	aim
ainsi	ainsi
aio	aio
air	air
aired	air
airless	airless
airs	air
airy	airi
ajax	ajax
akilling	akil
al	al
alabaster	alabast
alack	alack
alacrity	alacr
alarbus	alarbu
alarm	alarm
alarms	alarm
alarum	alarum
alarums	alarum
alas	ala
alb	alb
alban	alban
albans	alban
albany	albani
albeit	albeit
albion	albion
alchemist	alchemist
alchemy	
alchemi	
alcibiades	alcibiad
alcides	alcid
alder	alder
alderman	alderman
aldermen	aldermen
ale	al
alecto	alecto
alehouse	alehous
alehouses	alehous

alencon	alencon
alengon	alengon
aleppo	aleppo
ales	al
alewife	alewif
alexander	alexand
alexanders	alexand
alexandria	alexandria
alexandrian	alexandrian
alexas	alexa
alias	alia
alice	alic
alien	alien
aliena	aliena
alight	alight
alighted	alight
alights	alight
aliis	alii
alike	alik
alisander	alisand
alive	aliv
all	all
alla	alla
allay	allai
allayed	allai
allaying	allai
allayment	allay
allayments	allay
allays	allai
allegation	alleg
allegations	alleg
allege	alleg
alleged	alleg
allegiance	allegi
allegiant	allegi
alley	allei
alleys	allei
allhallowmas	allhallowma
alliance	allianc
allicholy	allicholi
allied	alli
allies	alli
alligant	allig
alligator	allig
allons	allon
allot	allot
allots	allot
allotted	allot

allottery	allotteri
allow	allow
allowance	allow
allowed	allow
allowing	allow
allows	
allow	
allur	allur
allure	allur
allurement	allur
alluring	allur
allusion	allus
ally	alli
allycholly	allycholli
almain	almain
almanac	almanac
almanack	almanack
almanacs	almanac
almighty	almighti
almond	almond
almost	almost
alms	alm
almsman	almsman
aloes	alo
aloft	aloft
alone	alon
along	along
alonso	alonso
aloof	aloof
aloud	aloud
alphabet	alphabet
alphabetical	alphabet
alphonso	alphonso
alps	alp
already	alreadi
also	also
alt	alt
altar	altar
altars	
	altar
alter	alter
alteration	alter
altered	alter
alters	alter
althaea	althaea
although	although
altitude	altitud
altogether	altogeth

alton	alton
alway	alwai
always	alwai
am	am
amaimon	amaimon
amain	amain
amaking	amak
amamon	amamon
amaz	amaz
amaze	amaz
amazed	amaz
amazedly	amazedli
amazedness	amazed
amazement	amaz
amazes	amaz
amazeth	amazeth
amazing	amaz
amazon	amazon
amazonian	amazonian
amazons	amazon
ambassador	ambassador
ambassadors	ambassador
amber	
amber	
ambiguides	ambiguid
ambiguities	ambigu
ambiguous	ambigu
ambition	ambit
ambitions	ambit
ambitious	ambiti
ambitiously	ambiti
amble	ambl
ambled	ambl
ambles	ambl
ambling	ambl
ambo	ambo
ambuscadoes	ambuscado
ambush	ambush
amen	amen
amend	amend
amended	amend
amendment	amend
amends	amend
amerce	amerc
america	america
ames	am
amiable	amiabl
amid	amid

amidst	amidst
amiens	amien
amis	ami
amiss	amiss
amities	amiti
amity	amiti
amnipotent	amnipot
among	among
amongst	amongst
amorous	amor
amorously	amor
amort	amort
amount	amount
amounts	amount
amour	amour
amphimachus	amphimacu
ample	ampl
ampler	ampler
amplest	amplest
amplified	amplifi
amplify	amplifi
amply	ampli
amphill	amphil
amurath	amurath
amyntas	amynta
an	an
anatomiz	anatomiz
anatomize	anatom
anatomy	anatomi
ancestor	ancestor
ancestors	ancestor
ancestry	ancestri
anchises	anchis
anchor	anchor
anchorage	anchorag
anchored	anchor
anchoring	anchor
anchors	anchor
anchovies	anchovi
ancient	ancient
ancientry	ancientri
ancients	ancient
ancus	ancu
and	and
andirons	andiron
andpholus	andpholu
andren	andren
andrew	andrew

andromache	andromach
andronici	andronici
andronicus	andronicu
anew	anew
ang	ang
angel	angel
angelica	angelica
angelical	angel
angelo	angelo
angels	angel
anger	anger
angerly	angerli
angers	anger
anges	ang
angiers	angier
angl	angl
anglais	anglai
angle	angl
angler	angler
angleterre	angleterr
angliae	anglia
angling	angl
anglish	anglish
angrily	angrili
angry	angri
anguish	anguish
angus	angu
animal	anim
animals	anim
animis	animi
anjou	anjou
ankle	ankl
anna	anna
annals	annal
anne	ann
annex	annex
annexed	annex
annexions	annexion
annexment	annex
annothanize	annothan
announces	announc
annoy	annoi
annoyance	annoy
annoying	annoi
annual	annual
anoint	anoint
anointed	anoint

anon	anon
another	anoth
anselmo	anselmo
answer	answer
answerable	answer
answered	answer
answerest	answerest
answering	answer
answers	answer
ant	ant
ante	ant
antenor	antenor
antenorides	antenorid
anteroom	anteroom
anthem	anthem
anthems	anthem
anthony	anthoni
anthropophagi	anthropophagi
anthropophaginian	anthropophaginian
antiates	antiat
antic	antic
anticipate	anticip
anticipates	anticip
anticipatest	anticipatest
anticipating	anticip
anticipation	anticip
antick	antick
anticly	anticli
antics	antic
antidote	antidot
antidotes	antidot
antigonus	antigonu
antiopa	antiopa
antipathy	antipathi
antipholus	antipholu
antipholuses	antipholus
antipodes	
antipod	
antiquary	antiquari
antique	antiqu
antiquity	antiqu
antium	antium
antoniad	antoniad
antonio	antonio
antonius	antoni
antony	antoni
antres	antr
anvil	anvil

any	ani
anybody	anybodi
anyone	anyon
anything	anyth
anywhere	anywher
ap	ap
apace	apac
apart	apart
apartment	apart
apartments	apart
ape	ap
apemantus	apemantu
apennines	apennin
apes	ap
apiece	apiec
apish	apish
apollinem	apollinem
apollo	apollo
apollodorus	apollodoru
apology	apolog
apoplex	apoplex
apoplexy	
	apoplexi
apostle	apostl
apostles	apostl
apostrophas	apostropha
apoth	apoth
apothecary	apothecari
appal	appal
appall	appal
appalled	appal
appals	appal
apparel	apparel
apparell	apparel
apparelled	apparel
apparent	appar
apparently	appar
apparition	apparit
apparitions	apparit
appeach	appeach
appeal	appeal
appeals	appeal
appear	appear
appearance	appear
appeared	appear
appeareth	appeareth
appearing	appear
appears	appear

appeas	appea
appease	appeas
appeased	appeas
appellant	appel
appele	appel
appellee	appele
appeles	appel
appelez	appelez
appellant	appel
appellants	appel
appelons	appelon
appendix	appendix
apperil	apperil
appertain	appertain
appertaining	appertain
appertainings	appertain
appertains	appertain
appertinent	appertin
appertinents	appertin
appetite	appetit
appetites	appetit
applaud	applaud
applauded	applaud
applauding	applaud
applause	applaus
applauses	applaus
apple	appl
apples	appl
appletart	appletart
appliance	applianc
appliances	applianc
applications	applic
applied	appli
applies	appli
apply	appli
applying	
appli	
appoint	appoint
appointed	appoint
appointment	appoint
appointments	appoint
appoints	appoint
apprehend	apprehend
apprehended	apprehend
apprehends	apprehend
apprehension	apprehens
apprehensions	apprehens

apprehensive	apprehens
apprendre	apprendr
apprenne	apprenn
apprenticehood	apprenticehood
appris	appri
approach	approach
approachers	approach
approaches	approach
approacheth	approacheth
approaching	approach
approbation	approb
aproof	aproof
appropriation	appropri
approv	approv
approve	approv
approved	approv
approvers	approv
approves	approv
appurtenance	appurten
appurtenances	
appurten	
apricocks	apricock
april	april
apron	apron
aprons	apron
apt	apt
apter	apter
aptest	aptest
aptly	aptli
aptness	apt
aqua	aqua
aquilon	aquilon
aquitaine	aquitain
arabia	arabia
arabian	arabian
araise	arais
arbitrate	arbitr
arbitrating	arbitr
arbitrator	arbitr
arbitrement	arbitr
arbors	arbor
arbour	arbour
arc	arc
arch	arch
archbishop	archbishop
archbishopric	archbishopr
archdeacon	archdeacon
arched	arch

archelaus	archelau
archer	archer
archers	archer
archery	
archeri	
archibald	archibald
archidamus	archidamu
architect	architect
arcu	arcu
arde	ard
arden	arden
ardent	ardent
ardour	ardour
are	ar
argal	argal
argier	argier
argo	argo
argosies	argosi
argosy	argosi
argu	argu
argue	argu
argued	argu
argues	argu
arguing	argu
argument	argument
arguments	argument
argus	argu
ariachne	ariachn
ariadne	ariadn
ariel	ariel
aries	ari
aright	aright
arinado	arinado
arinies	arini
arion	arion
arise	aris
arises	
aris	
ariseh	ariseh
arising	aris
aristode	aristod
aristotle	aristotl
arithmetic	arithmet
arithmetician	arithmetician
ark	ark
arm	arm
arma	arma
armado	armado

armadoes	armado
armagnac	armagnac
arme	arm
armed	arm
armenia	armenia
armies	armi
armigero	armigero
arming	arm
armipotent	armipot
armor	armor
armour	armour
armourer	armour
armourers	armour
armours	armour
armoury	armouri
arms	arm
army	armi
arn	arn
aroint	aroint
arose	aros
arouse	arous
aroused	arous
arragon	arragon
arraign	arraign
arraigned	arraign
arraigning	arraign
arraignment	arraign
arrant	arrant
arras	arra
array	arra
arrearages	arrearag
arrest	arrest
arrested	arrest
arrests	arrest
arriv	arriv
arrival	arriv
arrivance	arriv
arrive	arriv
arrived	arriv
arrives	arriv
arriving	arriv
arrogance	arrog
arrogancy	arrog
arrogant	arrog
arrow	arrow
arrows	arrow
art	art
artemidorus	artemidoru

arteries	arteri
arthur	arthur
article	articl
articles	articl
articulate	
articul	
artificer	artific
artificial	artifici
artillery	artilleri
artire	artir
artist	artist
artists	artist
artless	artless
artois	artoi
arts	art
artus	artu
arviragus	arviragu
as	as
asaph	asaph
ascanius	ascaniu
ascend	ascend
ascended	ascend
ascendeth	ascendeth
ascends	ascend
ascension	ascens
ascent	ascent
ascribe	ascrib
ascribes	ascrib
ash	ash
asham	asham
ashamed	asham
asher	asher
ashes	ash
ashford	ashford
ashore	ashor
ashouting	ashout
ashy	ashi
asia	asia
aside	asid
ask	ask
askance	askanc
asked	ask
asker	asker
asketh	asketh
asking	ask
asks	ask
aslant	aslant
asleep	asleep

asmath	asmath
asp	asp
aspect	aspect
aspects	aspect
aspen	aspen
aspersion	aspers
aspic	aspic
aspicious	aspici
aspics	aspic
aspir	aspir
aspiration	aspir
aspire	aspir
aspiring	aspir
asquint	asquint
ass	ass
assail	assail
assailable	assail
assailant	assail
assailants	assail
assailed	assail
assailleth	assailleth
assailing	assail
assails	assail
assassination	assassin
assault	assault
assaulted	assault
assaults	assault
assay	assai
assaying	assai
assays	assai
assemblance	assembl
assemble	assembl
assembled	assembl
assemblies	assembl
assembly	assembl
assent	assent
asses	ass
assez	assez
assign	assign
assigned	assign
assigns	assign
assinico	assinico
assist	assist
assistance	assist
assistances	assist
assistant	assist
assistants	assist

assisted	assist
assisting	assist
associate	associ
associated	associ
associates	associ
assuage	
assuag	
assubjugate	assubjug
assum	assum
assume	assum
assumes	assum
assumption	assumpt
assur	assur
assurance	assur
assure	assur
assured	assur
assuredly	assuredli
assures	assur
assyrian	assyrian
astonish	astonish
astonished	astonish
astraea	astraea
astray	astrai
astrea	astrea
astronomer	astronom
astronomers	astronom
astronomical	astronom
astronomy	astronomi
asunder	asund
at	at
atalanta	atalanta
ate	at
ates	at
athenian	athenian
athenians	athenian
athens	athen
athol	athol
athversary	
athversari	
athwart	athwart
atlas	atla
atomies	atomi
atomy	atomi
atone	aton
atonement	aton
atonements	aton
atropos	atropo
attach	attach

attached	attach
attachment	attach
attain	attain
attainder	attaind
attains	attain
attaint	attaint
attainted	attaint
attainture	attaintur
attempt	attempt
attemptable	attempt
attempted	attempt
attempting	attempt
attempts	attempt
attend	attend
attendance	attend
attendant	attend
attendants	attend
attended	attend
attendants	attend
attendeth	attendeth
attending	attend
attends	
attend	
attent	attent
attention	attent
attentive	attent
attentiveness	attentiven
attest	attest
attested	attest
attir	attir
attire	attir
attired	attir
attires	attir
attorney	attornei
attorneyed	attornei
attorneys	attornei
attorneyship	attorneyship
attract	attract
attraction	attract
attractive	attract
attracts	attract
attribute	attribut
attributed	attribut
attributes	attribut
attribution	attribut
attributive	attribut
atwain	atwain
au	au

aubrey	aubrei
auburn	auburn
aucun	aucun
audacious	audaci
audaciously	audaci
audacity	audac
audible	audibl
audience	audienc
audis	audi
audit	audit
auditor	auditor
auditors	auditor
auditory	auditori
audre	audr
audrey	audrei
aufidius	aufidiu
aufidiuses	aufidius
auger	auger
aught	aught
augment	augment
augmentation	augment
augmented	augment
augmenting	augment
augurer	augur
augurers	augur
augures	augur
auguring	augur
augurs	augur
augury	auguri
august	august
augustus	augustu
auld	auld
amerle	amerl
aunchient	aunchient
aunt	aunt
aunts	aunt
auricular	
auricular	
aurora	aurora
auspicious	auspici
aussi	aussi
austere	auster
austerely	auster
austereness	auster
austerity	auster
austria	austria
aut	aut
authentic	authent

author	author
authorities	author
authority	author
authorized	author
authorizing	author
authors	author
autolycus	autolycu
autre	autr
autumn	autumn
auvergne	auvergn
avail	avail
avails	avail
avarice	avaric
avaricious	avarici
avaunt	avaunt
ave	av
aveng	aveng
avenge	aveng
avenged	aveng
averring	aver
avert	
avert	
aves	av
avez	avez
avis	avi
avoid	avoid
avoided	avoid
avoiding	avoid
avoids	avoid
avoirdupois	avoirdupo
avouch	avouch
avouched	avouch
avouches	avouch
avouchment	avouch
avow	avow
aw	aw
await	await
awaits	await
awak	awak
awake	awak
awaked	awak
awaken	awaken
awakened	awaken
awakens	awaken
awakes	awak
awaking	awak
award	award
awards	award

awasy	awasi
away	awai
awe	aw
awearly	aweari
aweless	aweless
awful	aw
awhile	
awhil	
awkward	awkward
awl	awl
awooing	awoo
awork	awork
awry	awri
axe	ax
axle	axl
axletree	axletre
ay	ay
aye	ay
ayez	ayez
ayli	ayli
azur	azur
azure	azur
b	b
ba	ba
baa	baa
babbl	babbl
babble	babbl
babbling	babbl
babe	babe
babes	babe
babies	babi
baboon	baboon
baboons	baboon
baby	babi
babylon	babylon
bacare	bacar
bacchanals	bacchan
bacchus	bacchu
bach	bach
bachelor	bachelor
bachelors	bachelor
back	back
backbite	backbit
backbitten	backbitten
backing	back
backs	back
backward	backward
backwardly	backwardli

backwards	backward
bacon	bacon
bacons	bacon
bad	bad
bade	bade
badge	badg
badged	badg
badges	badg
badly	badli
badness	bad
baes	bae
baffl	baffl
baffle	baffl
baffled	baffl
bag	bag
baggage	baggag
bagot	bagot
bagpipe	bagpip
bags	bag
bail	bail
bailiff	bailiff
baillez	baillez
baily	baili
baisant	baisant
baisees	baise
baiser	baiser
bait	bait
baited	bait
baiting	bait
baitings	bait
baits	bait
bajazet	bajazet
bak	bak
bake	bake
baked	bake
baker	baker
bakers	baker
bakes	bake
baking	bake
bal	bal
balanc	balanc
balance	balanc
balcony	balconi
bald	bald
baldrick	baldrick
bale	bale
baleful	bale
balk	balk

ball	ball
ballad	ballad
ballads	ballad
ballast	ballast
ballasting	ballast
ballet	ballet
ballow	ballow
balls	ball
balm	
	balm
balms	balm
balmy	balmi
balsam	balsam
balsamum	balsamum
balth	balth
balthasar	balthasar
balthazar	balthazar
bames	bame
ban	ban
banbury	banburi
band	band
bandied	bandi
banding	band
bandit	bandit
banditti	banditti
banditto	banditto
bands	band
bandy	bandi
bandying	bandi
bane	bane
banes	bane
bang	bang
bangor	bangor
banish	banish
banished	banish
banishers	banish
banishment	banish
banister	banist
bank	bank
bankrout	bankrout
bankrupt	bankrupt
bankrupts	bankrupt
banks	bank
banner	banner
bannerets	banneret
banners	banner
banning	ban
banns	bann

banquet	banquet
banqueted	banquet
banqueting	banquet
banquets	banquet
banquo	banquo
bans	ban
baptism	baptism
baptista	baptista
baptiz	baptiz
bar	bar
barbarian	barbarian
barbarians	barbarian
barbarism	barbar
barbarous	barbar
barbary	barbari
barbason	barbason
barbed	barb
barber	barber
barbermonger	barbermong
bard	bard
bardolph	bardolph
bards	bard
bare	bare
bared	bare
barefac	barefac
barefaced	barefac
barefoot	barefoot
bareheaded	barehead
barely	bare
bareness	bare
barful	bar
bargain	bargain
bargains	bargain
barge	barg
bargulus	bargulu
baring	bare
bark	bark
barking	bark
barkloughly	barkloughli
barks	bark
barky	barki
barley	barlei
barm	barm
barn	barn
barnacles	barnacl
barnardine	barnardin
barne	barn
barnes	barn

barnet	barnet
barns	barn
baron	baron
barons	baron
barony	baroni
barr	barr
barrabas	barraba
barrel	
barrel	
barrels	barrel
barren	barren
barrenly	barrenli
barrenness	barren
barricado	barricado
barricadoes	barricado
barrow	barrow
bars	bar
barson	barson
barter	barter
bartholomew	bartholomew
bas	ba
basan	basan
base	base
baseless	baseless
basely	base
baseness	base
baser	baser
bases	base
basest	basest
bashful	bash
bashfulness	bash
basilisco	basilisco
basilisk	basilisk
basilisks	basilisk
basimecu	basimecu
basin	basin
basingstoke	basingstok
basins	basin
basis	basi
bask	
bask	
basket	basket
baskets	basket
bass	bass
bassanio	bassanio
basset	basset
bassianus	bassianu
basta	basta

bastard	bastard
bastardizing	bastard
bastardly	bastardli
bastards	bastard
bastardy	bastardi
basted	bast
bastes	bast
bastinado	bastinado
basting	bast
bat	bat
batailles	batail
batch	batch
bate	bate
bated	bate
bates	bate
bath	bath
bathe	bath
bathed	bath
bathing	bath
baths	bath
bating	bate
batler	batler
bats	bat
batt	batt
battalia	
battalia	
battalions	battalion
batten	batten
batter	batter
battering	batter
batters	batter
battery	batteri
battle	battl
battled	battl
battlefield	battlefield
battlements	battlement
battles	battl
batty	batti
bauble	baubl
baubles	baubl
baubling	baubl
baulk	baulk
bavin	bavin
bawcock	bawcock
bawd	bawd
bawdry	bawdri
bawds	bawd
bawdy	bawdi

bawl	bawl
bawling	bawl
bay	bai
baying	bai
baynard	baynard
bayonne	bayonn
bays	bai
be	be
beach	beach
beached	
beach	
beachy	beachi
beacon	beacon
bead	bead
beaded	bead
beadle	beadl
beadles	beadl
beads	bead
beadsmen	beadsmen
beagle	beagl
beagles	beagl
beak	beak
beaks	beak
beam	beam
beamed	beam
beams	beam
bean	bean
beans	bean
bear	bear
beard	beard
bearded	beard
beardless	beardless
beards	beard
bearer	bearer
bearers	bearer
bearest	bearest
beareth	beareth
bearing	bear
bears	bear
beast	beast
beastliest	beastliest
beastliness	beastli
beastly	
beastli	
beasts	beast
beat	beat
beated	beat
beaten	beaten

beating	beat
beatrice	beatric
beats	beat
beau	beau
beaufort	beaufort
beaumont	beaumont
beauteous	beauteou
beautied	beauti
beauties	beauti
beautified	beautifi
beautiful	beauti
beautify	beautifi
beauty	beauti
beaver	beaver
beavers	beaver
became	becam
because	becaus
bechanc	bechanc
bechance	bechanc
bechanced	bechanc
beck	beck
beckon	beckon
beckons	beckon
becks	beck
becom	becom
become	
becom	
becomed	becom
becomes	becom
becoming	becom
becomings	becom
bed	bed
bedabbled	bedabbl
bedash	bedash
bedaub	bedaub
bedazzled	bedazzl
bedchamber	bedchamb
bedclothes	bedcloth
bedded	bed
bedeck	bedeck
bedecking	bedeck
bedew	bedew
bedfellow	bedfellow
bedfellows	bedfellow
bedford	bedford
bedlam	bedlam
bedrench	bedrench

bedrid	bedrid
beds	bed
bedtime	bedtim
bedward	bedward
bee	bee
beef	beef
beefs	beef
beehives	beehiv
been	been
beer	beer
bees	bee
beest	
	beest
beetle	beetl
beetles	beetl
beeves	beev
befall	befal
befallen	befallen
befalls	befal
befell	befel
befits	befit
befitted	befit
befitting	befit
befor	befor
before	befor
beforehand	beforehand
befortune	befortun
befriend	befriend
befriended	befriend
befriends	befriend
beg	beg
began	began
beget	beget
begets	beget
begetting	beget
begg	begg
beggar	beggar
beggared	beggar
beggarly	beggarli
beggarman	beggarman
beggars	beggar
beggary	beggari
begging	beg
begin	
begin	
beginners	beginn
beginning	begin
beginnings	begin

begins	begin
begnawn	begnawn
begone	begon
begot	begot
begotten	begotten
begrimed	begrim
begs	beg
beguil	beguil
beguile	beguil
beguiled	beguil
beguiles	beguil
beguiling	beguil
begun	begun
behalf	behalf
behalfs	behalf
behav	behav
behaved	behav
behavedst	behavedst
behavior	behavior
behaviors	behavior
behaviour	behaviour
behaviours	behaviour
behead	behead
beheaded	behead
beheld	beheld
behest	behest
behests	behest
behind	behind
behold	behold
beholder	behold
beholders	behold
beholdest	beholdest
beholding	behold
beholds	behold
behoof	behoof
behooffull	behoofful
behooves	behoov
behove	behov
behoves	behov
behows	behowl
being	be
bel	bel
belarius	belariu
belch	belch
belching	belch
beldam	beldam
beldame	beldam
beldams	beldam

belee	bele
belgia	belgia
belie	beli
belied	beli
belief	belief
beliest	beliest
believ	believ
believe	believ
believed	believ
believes	believ
believest	believest
believing	
believ	
belike	belik
bell	bell
bellario	bellario
belle	bell
bellied	belli
bellies	belli
bellman	bellman
bellona	bellona
bellow	bellow
bellowed	bellow
bellowing	bellow
bellows	bellow
bells	bell
belly	belli
bellyful	belly
belman	belman
belmont	belmont
belock	belock
belong	belong
belonging	belong
belongings	belong
belongs	belong
belov	belov
beloved	belov
beloving	belov
below	below
belt	belt
belzebub	belzebub
bemadding	bemad
bemet	bemet
bemete	bemet
bemoan	bemoan
bemoaned	bemoan
bemock	bemock
bemoil	bemoil

bemonster	bemonst
ben	ben
bench	bench
bencher	bencher
benches	bench
bend	bend
bended	bend
bending	bend
bends	bend
bene	bene
beneath	beneath
benedicite	benedicit
benedick	benedick
benediction	benedict
benedictus	benedictu
benefactors	benefactor
benefice	benefic
beneficial	benefici
benefit	benefit
benefited	benefit
benefits	benefit
benetted	benet
benevolence	benevol
benevolences	benevol
benied	beni
benison	benison
bennet	bennet
bent	bent
bentii	bentii
bentivolii	bentivolii
bents	bent
benumbed	benumb
benvolio	benvolio
bepaint	bepaint
bepray	beprai
bequeath	bequeath
bequeathed	bequeath
bequeathing	bequeath
bequest	bequest
ber	ber
berard	berard
berattle	berattl
beray	berai
bere	bere
bereave	bereav
bereaved	bereav
bereaves	bereav
bereft	bereft

bergamo	bergamo
bergomask	bergomask
berhym	berhym
berhyme	berhym
berkeley	berkelei
bermoother	bermoother
bernardo	bernardo
berod	berod
berowne	berown
berri	
berri	
berries	berri
berrord	berrord
berry	berri
bertram	bertram
berwick	berwick
bescreen	bescreen
beseech	beseech
beseched	beseech
beseechers	beseech
beseeching	beseech
beseek	beseek
beseem	beseem
beseemeth	beseemeth
beseeming	beseem
beseems	beseem
beset	beset
beshrew	beshrew
beside	besid
besides	besid
besieg	besieg
besiege	besieg
besieged	besieg
beslubber	beslubb
besmear	besmear
besmeared	besmear
besmirch	besmirch
besom	besom
besort	besort
besotted	besot
bespake	bespak
bespeak	
bespeak	
bespice	bespic
bespoke	bespok
bespotted	bespot
bess	bess
bessy	bessi

best	best
bestained	bestain
bested	best
bestial	bestial
bestir	bestir
bestirr	bestirr
bestow	bestow
bestowed	bestow
bestowing	bestow
bestows	bestow
bestraught	bestraught
bestrew	bestrew
bestrid	bestrid
bestride	bestrid
bestrides	bestrid
bet	bet
betake	betak
beteem	beteem
bethink	bethink
bethought	bethought
bethrothed	bethroth
bethump	bethump
betid	betid
betide	betid
betideth	betideth
betime	
betim	
betimes	betim
betoken	betoken
betook	betook
betossed	betoss
betray	betrai
betrayed	betrai
betraying	betrai
betrays	betrai
betrim	betrim
betroth	betroth
betrothed	betroth
betroths	betroth
bett	bett
betted	bet
better	better
bettered	better
bettering	better
betters	better
betting	bet
bettre	bettr
between	between

betwixt	betwixt
bevel	bevel
beverage	beverag
bevis	bevi
bevy	bevi
bewail	bewail
bewailed	bewail
bewailing	bewail
bewails	bewail
beware	bewar
bewasted	
bewast	
bewEEP	beweep
bewept	bewept
bewet	bewet
bewhored	bewhor
bewitch	bewitch
bewitched	bewitch
bewitchment	bewitch
bewray	bewrai
beyond	beyond
bezonian	bezonian
bezonians	bezonian
bianca	bianca
bianco	bianco
bias	bia
bibble	bibbl
bickerings	bicker
bid	bid
bidden	bidden
bidding	bid
biddings	bid
bidly	bidli
bide	bide
bides	bide
biding	bide
bids	bid
bien	bien
bier	bier
bifold	bifold
big	big
bigamy	bigami
biggen	biggen
bigger	
bigger	
bigness	big
bigot	bigot
bilberry	bilberri

bilbo	bilbo
bilboes	bilbo
bilbow	bilbow
bill	bill
billeted	billet
billets	billet
billiards	billiard
billing	bill
billow	billow
billows	billow
bills	bill
bin	bin
bind	bind
bindeth	bindeth
binding	bind
binds	bind
biondello	biondello
birch	birch
bird	bird
birding	bird
birdlime	birdlim
birds	bird
birnam	birnam
birth	birth
birthday	birthdai
birthdom	birthdom
birthplace	birthplac
birthright	birthright
birthrights	birthright
births	birth
bis	bi
biscuit	biscuit
bishop	bishop
bishops	bishop
bisson	bisson
bit	bit
bitch	bitch
bite	bite
biter	biter
bites	bite
biting	bite
bits	bit
bitt	bitt
bitten	bitten
bitter	bitter
bitterest	bitterest
bitterly	bitterli
bitterness	bitter

blab	blab
blabb	blabb
blabbing	blab
blabs	blab
black	black
blackamoor	blackamoor
blackamoors	blackamoor
blackberries	blackberri
blackberry	blackberri
blacker	blacker
blackest	blackest
blackfriars	blackfriar
blackheath	blackheath
blackmere	blackmer
blackness	black
blacks	black
bladder	bladder
bladders	bladder
blade	blade
bladed	blade
blades	blade
blains	blain
blam	blam
blame	blame
blamed	blame
blameful	blame
blameless	blameless
blames	blame
blanc	blanc
blanca	blanca
blanch	blanch
blank	blank
blanket	blanket
blanks	blank
blaspheme	blasphem
blaspheming	blasphem
blasphemous	blasphem
blasphemy	blasphemi
blast	blast
blasted	blast
blasting	blast
blastments	blastment
blasts	blast
blaz	blaz
blaze	blaze
blazes	blaze
blazing	blaze

blazon	blazon
blazoned	blazon
blazoning	blazon
bleach	bleach
bleaching	bleach
bleak	bleak
blear	blear
bleared	blear
bleat	bleat
bleated	bleat
bleats	bleat
bled	bled
bleed	bleed
bleedest	bleedest
bleedeth	bleedeth
bleeding	bleed
bleeds	bleed
blemish	blemish
blemishes	blemish
blench	blench
blenches	blench
blend	blend
blended	blend
blent	blent
bless	bless
blessed	bless
blessedly	
blessedly	
blessedness	blessed
blesses	bless
blesseth	blesseth
blessing	bless
blessings	bless
blest	blest
blew	blew
blind	blind
blinded	blind
blindfold	blindfold
blinding	blind
blindly	blindli
blindness	blind
blinds	blind
blink	blink
blinking	blink
bliss	bliss
blist	blist
blister	blister
blisters	blister

blithe	blith
blithild	blithild
bloat	bloat
block	block
blockish	blockish
blocks	block
blois	bloi
blood	blood
blooded	blood
bloodhound	bloodhound
bloodied	bloodi
bloodier	bloodier
bloodiest	bloodiest
bloodily	bloodili
bloodless	bloodless
bloods	blood
bloodshed	bloodsh
bloodshedding	bloodshed
bloodstained	bloodstain
bloody	bloodi
bloom	bloom
blooms	bloom
blossom	blossom
blossoming	blossom
blossoms	blossom
blot	blot
blots	blot
blotted	blot
blotting	blot
blount	blount
blow	blow
blowed	blow
blowers	blower
blowest	blowest
blowing	blow
blown	blown
blows	blow
blowse	blows
blubb	blubb
blubber	blubber
blubbering	blubber
blue	blue
bluecaps	bluecap
bluest	bluest
blunt	blunt
blunted	blunt

blunter	blunter
bluntest	bluntest
blunting	blunt
bluntly	bluntli
bluntness	blunt
blunts	blunt
blur	blur
blurr	blurr
blurs	blur
blush	blush
blushes	blush
blushest	blushest
blushing	blush
blust	blust
bluster	bluster
blusterer	bluster
blusters	bluster
bo	bo
boar	boar
board	board
boarded	board
boarding	board
boards	board
boarish	boarish
boars	boar
boast	boast
boasted	boast
boastful	boast
boasting	
boast	
boasts	boast
boat	boat
boats	boat
boatswain	boatswain
bob	bob
bobb	bobb
boblibindo	boblibindo
bobtail	bobtail
bocchus	bocchu
bode	bode
boded	bode
bodements	bodement
bodes	bode
bodg	bodg
bodied	bodi
bodies	bodi
bodiless	bodiless
bodily	bodili

boding	bode
bodkin	bodkin
body	bodi
bodykins	bodykin
bog	bog
boggle	boggl
boggler	boggler
bogs	bog
bohemia	bohemia
bohemian	bohemian
bohun	bohun
boil	boil
boiling	boil
boils	boil
boist	boist
boisterous	boister
boisterously	boister
boitier	boitier
bold	bold
bolden	bolden
bolder	bolder
boldest	boldest
boldly	boldli
boldness	bold
bolds	bold
bolingbroke	bolingbrok
bolster	bolster
bolt	bolt
bolted	bolt
bolter	bolter
bolters	bolter
bolting	bolt
bolts	bolt
bombard	bombard
bombards	bombard
bombast	bombast
bon	bon
bona	bona
bond	bond
bondage	bondag
bonded	bond
bondmaid	bondmaid
bondman	bondman
bondmen	bondmen
bonds	
bond	
bondslave	bondslav

bone	bone
boneless	boneless
bones	bone
bonfire	bonfir
bonfires	bonfir
bonjour	bonjour
bonne	bonn
bonnet	bonnet
bonneted	bonnet
bonny	bonni
bonos	bono
bonto	bonto
bonville	bonvil
bood	bood
book	book
bookish	bookish
books	book
boon	boon
boor	boor
boorish	boorish
boors	boor
boot	boot
booted	boot
booties	booti
bootless	bootless
boots	boot
booty	booti
bor	bor
bora	bora
borachio	borachio
bordeaux	
bordeaux	
border	border
bordered	border
borderers	border
borders	border
bore	bore
boreas	borea
bores	bore
boring	bore
born	born
borne	born
borough	borough
boroughs	borough
borrow	borrow
borrowed	borrow
borrower	borrow
borrowing	borrow

borrows	borrow
bosko	bosko
boskos	bosko
bosky	boski
bosom	bosom
bosoms	bosom
boson	boson
boss	boss
bosworth	bosworth
botch	botch
botcher	botcher
botches	botch
botchy	botchi
both	both
bots	bot
bottle	
bottl	
bottled	bottl
bottles	bottl
bottom	bottom
bottomless	bottomless
bottoms	bottom
bouciqualt	bouciqualt
bouge	boug
bough	bough
boughs	bough
bought	bought
bounce	bounc
bouncing	bounc
bound	bound
bounded	bound
bounden	bounden
boundeth	boundeth
bounding	bound
boundless	boundless
bounds	bound
bounteous	bunteou
bounteously	bounteous
bounties	bounti
bountiful	bounti
bountifully	bountifulli
bounty	bounti
bourbier	bourbier
bourbon	bourbon
bourchier	bourchier
bourdeaux	bourdeaux
ourn	ourn
bout	

bout

bouts	bout
bove	bove
bow	bow
bowcase	bowcas
bowed	bow
bowels	bowel
bower	bower
bowing	bow
bowl	bowl
bowler	bowler
bowling	bowl
bowls	bowl
bows	bow
bowsprit	bowsprit
bowstring	bowstr
box	box
boxes	box
boy	boi
boyet	boyet
boyish	boyish
boys	boi
brabant	brabant
brabantio	brabantio
brabble	brabbl
brabbler	brabbler
brac	brac
brace	brace
bracelet	bracelet
bracelets	bracelet
brach	brach
bracy	braci
brag	
brag	
bragg	bragg
braggardism	braggard
braggards	braggard
braggart	braggart
braggarts	braggart
bragged	brag
bragging	brag
bragless	bragless
brags	brag
braid	braid
braided	braid
brain	brain
brained	brain
brainford	brainford

brainish	brainish
brainless	brainless
brains	brain
brainsick	brainsick
brainsickly	brainsickli
brake	brake
brakenbury	brakenburi
brakes	brake
brambles	brambl
bran	bran
branch	branch
branches	branch
branchless	branchless
brand	brand
branded	brand
brandish	brandish
brandon	
	brandon
brands	brand
bras	bra
brass	brass
brassy	brassi
brat	brat
brats	brat
brav	brav
brave	brave
braved	brave
bravely	brave
braver	braver
bravery	braveri
braves	brave
bravest	bravest
braving	brave
brawl	brawl
brawler	brawler
brawling	brawl
brawls	brawl
brawn	brawn
brawns	brawn
bray	brai
braying	brai
braz	braz
brazen	brazen
brazier	brazier
breach	breach
breaches	breach
bread	bread
breadth	breadth

break	break
breaker	
breaker	
breakfast	breakfast
breaking	break
breaks	break
breast	breast
breasted	breast
breasting	breast
breastplate	breastplat
breasts	breast
breath	breath
breathe	breath
breathed	breath
breather	breather
breathers	breather
breathes	breath
breathest	breathest
breathing	breath
breathless	breathless
breaths	breath
brecknock	brecknock
bred	bred
breech	breech
breeches	breech
breeching	breech
breed	breed
breeder	breeder
breeders	breeder
breeding	breed
breeds	breed
breese	brees
breeze	breez
breff	breff
bretagne	bretagn
brethen	brethen
bretheren	bretheren
brethren	brethren
brevis	brevi
brevity	breviti
brew	brew
brewage	brewag
brewer	brewer
brewers	brewer
brewing	brew
brews	brew
briareus	briareu
briars	briar

brib	brib
bribe	bribe
briber	briber
bribes	bribe
brick	brick
bricklayer	bricklay
bricks	brick
bridal	bridal
bride	bride
bridegroom	bridegroom
bridegrooms	bridegroom
brides	bride
bridge	bridg
bridgenorth	bridgenorth
bridges	bridg
bridget	bridget
bridle	bridl
bridled	bridl
brief	brief
brieger	brieger
briefest	briefest
briefly	briefli
briefness	brief
brier	brier
briers	brier
brigandine	brigandin
bright	bright
brighten	brighten
brightest	brightest
brightly	brightli
brightness	bright
brim	brim
brimful	brim
brims	brim
brimstone	brimston
brinded	brind
brine	brine
bring	bring
bringer	bringer
bringeth	bringeth
bringing	bring
bringings	bring
brings	bring
brinish	brinish
brink	brink
brisk	brisk
brisky	briski
bristle	

	bristl
bristled	bristl
bristly	bristli
bristol	bristol
bristow	bristow
britain	britain
britann	britann
britannes	britann
british	british
briton	briton
britons	briton
brittany	brittani
brittle	brittl
broach	broach
broached	broach
broad	broad
broader	broader
broadside	broadsid
brocas	broca
brock	brock
brogues	brogu
broil	broil
broiling	broil
broils	broil
broke	broke
broken	broken
brokenly	brokenli
broker	broker
brokers	broker
brokes	broke
broking	broke
brooch	

	brooch
brooches	brooch
brood	brood
brooded	brood
brooding	brood
brook	brook
brooks	brook
broom	broom
broomstaff	broomstaff
broth	broth
brothel	brothel
brother	brother
brotherhood	brotherhood
brotherhoods	brotherhood
brotherly	brotherli
brothers	brother

broths	broth
brought	brought
brow	brow
brown	brown
browner	browner
brownist	brownist
browny	browni
brows	brow
browse	brows
browsing	brows
bruise	brui
bruise	bruise
bruised	bruise
bruises	bruise
bruising	bruise
bruit	
bruit	
bruted	bruit
brundusium	brundusium
brunt	brunt
brush	brush
brushes	brush
brute	brute
brutish	brutish
brutus	brutu
bubble	bubbl
bubbles	bubbl
bubbling	bubbl
bubukles	bubukl
buck	buck
bucket	bucket
buckets	bucket
bucking	buck
buckingham	buckingham
buckle	buckl
buckled	buckl
buckler	buckler
bucklers	buckler
bucklersbury	bucklersburi
buckles	buckl
buckram	buckram
bucks	buck
bud	bud
budded	bud
budding	bud
budge	budg
budger	budger
budget	budget

buds	
	bud
buff	buff
buffet	buffet
buffeting	buffet
buffets	buffet
bug	bug
bugbear	bugbear
bugle	bugl
bugs	bug
build	build
builded	build
buildeth	buildeth
building	build
buildings	build
builds	build
built	built
bulk	bulk
bulks	bulk
bull	bull
bullcalf	bullcalf
bullen	bullen
bullens	bullen
bullet	bullet
bullets	bullet
bullocks	bullock
bulls	bull
bully	bulli
bulmer	bulmer
bulwark	bulwark
bulwarks	bulwark
bum	bum
bumbast	bumbast
bump	bump
bumper	bumper
bums	bum
bunch	bunch
bunches	bunch
bundle	bundl
bung	bung
bunghole	bunghol
bungle	bungl
bunting	bunt
buoy	buoi
bur	bur
burbolt	burbolt
burd	burd

burden	burden
burdened	burden
burdening	burden
burdenous	burden
burdens	burden
burgh	burgh
burgher	burgher
burghers	burgher
burglary	burglari
burgomasters	burgomast
burgonet	burgonet
burgundy	burgundi
burial	burial
buried	huri
burier	burier
buriest	buriest
burly	burli
burn	
burn	
burned	burn
burnet	burnet
burneth	burneth
burning	burn
burnish	burnish
burns	burn
burnt	burnt
burr	burr
burrows	burrow
burs	bur
burst	burst
bursting	burst
bursts	burst
burthen	burthen
burthens	burthen
burton	burton
bury	huri
burying	huri
bush	bush
bushels	bushel
bushes	bush
bushy	bushi
busied	busi
busily	busili
business	busin
business	busi
businesses	busi
buskin	buskin
busky	buski

buss	buss
busses	buss
bussing	buss
bustle	bustl
bustling	bustl
busy	busi
but	but
butcheed	butche
butcher	butcher
butchered	butcher
butcheries	butcheri
butcherly	butcherli
butchers	butcher
butchery	butcheri
butler	butler
butt	butt
butter	butter
battered	butter
butterflies	butterfli
butterfly	butterfli
butterwoman	butterwoman
buttery	butteri
buttock	buttock
buttocks	buttock
button	button
buttonhole	buttonhol
buttons	button
butress	butress
buttry	buttri
butts	butt
buxom	buxom
buy	bui
buyer	buyer
buying	bui
buys	bui
buzz	buzz
buzzard	buzzard
buzzards	buzzard
buzzers	buzzer
buzzing	buzz
by	by
bye	bye
byzantium	byzantium
c	c
ca	ca
cabbage	cabbag
cabileros	cabilero

cabin	cabin
cabins	cabin
cable	cabl
cables	cabl
cackling	cackl
cacodemon	cacodemon
caddis	caddi
caddisses	caddiss
cade	cade
cadence	cadenc
cadent	cadent
caedes	cade
cadmus	cadmu
caduceus	caduceu
cadwal	cadwal
cadwallader	cadwallad
caelius	caeliu
caelo	caelo
caesar	caesar
caesarion	caesarion
caesars	caesar
cage	cage
caged	cage
cagion	cagion
cain	cain
caithness	caith
caitiff	caitiff
caitiffs	caitiff
caius	caiu
cak	cak
cake	cake
cakes	cake
calaber	calab
calais	calai
calamities	calam
calamity	calam
calchas	calcha
calculate	calcul
calen	calen
calendar	calendar
calendars	calendar
calf	calf
caliban	caliban
calibans	caliban
calipolis	calipoli
cality	caliti
caliver	caliv
call	call

callat	callat
called	call
callet	
callet	
calling	call
calls	call
calm	calm
calmest	calmest
calmly	calmli
calmness	calm
calms	calm
calpurnia	calpurnia
calumniate	calumni
calumniating	calumni
calumnious	calumni
calumny	calumni
calve	calv
calved	calv
calves	calv
calveskins	calveskin
calydon	calydon
cam	cam
cambio	cambio
cambria	cambria
cambric	cambric
cambrics	cambric
cambridge	cambridg
cambyses	cambys
came	came
camel	camel
camelot	camelot
camels	camel
camest	camest
camillo	camillo
camlet	camlet
camomile	camomil
camp	camp
campeius	campeiu
camping	camp
camps	camp
can	can
canakin	canakin
canaries	canari
canary	canari
cancel	cancel
cancell	cancel
cancelled	cancel
cancelling	cancel

cancel	cancel
cancer	cancer
candidatus	candidatu
candied	candi
candle	candl
candles	candl
candlesticks	candlestick
candy	candi
canidius	canidiu
cank	cank
canker	canker
cankerblossom	cankerblossom
cankers	canker
cannibally	cannib
cannibals	cannib
cannon	cannon
cannoneer	cannon
cannons	cannon
cannot	
	cannot
canon	canon
canoniz	canoniz
canonize	canon
canonized	canon
canons	canon
canopied	canopi
canopies	canopi
canopy	canopi
canst	canst
canstick	canstick
canterbury	canterburi
cantle	cantl
cantons	canton
canus	canu
canvas	canva
canvass	canvass
canzonet	canzonet
cap	cap
capability	capabl
capable	capabl
capacities	capac
capacity	capac
caparison	caparison
capdv	capdv
cape	cape
capel	capel
capels	capel
caper	caper

capers	caper
capet	capet
caphis	
caphi	
capilet	capilet
capitaine	captain
capital	capit
capite	capit
capitol	capitol
capitulate	capitul
capocchia	capocchia
capon	capon
capons	capon
capp	capp
cappadocia	cappadocia
capriccio	capriccio
capricious	caprici
caps	cap
capt	capt
captain	captain
captains	captain
captainship	captainship
captious	captiou
captivate	captiv
captivated	captiv
captivates	captiv
captive	captiv
captives	captiv
captivity	captiv
captum	captum
capucius	capuciu
capulet	capulet
capulets	capulet
car	car
carack	
carack	
caracks	carack
carat	carat
caraways	carawai
carbonado	carbonado
carbuncle	carbuncl
carbuncled	carbuncl
carbuncles	carbuncl
carcanet	carcanet
carcase	carcas
carcases	carcas
carcass	carcass
carcasses	carcass

card	card
cardecue	cardecu
carded	card
carders	carder
cardinal	cardin
cardinally	cardin
cardinals	cardin
cardmaker	cardmak
cards	card
carduus	carduu
care	care
cared	care
career	career
careers	career
careful	care
carefully	carefulli
careless	careless
carelessly	carelessli
carelessness	
careless	
cares	care
caret	caret
cargo	cargo
carl	carl
carlisle	carlisl
carlot	carlot
carman	carman
carmen	carmen
carnal	carnal
carnally	carnal
carnarvonshire	carnarvonshir
carnation	carnat
carnations	carnat
carol	carol
carous	carou
carouse	carous
caroused	carous
carouses	carous
carousing	carous
carp	carp
carpenter	carpent
carper	carper
carpet	carpet
carpets	carpet
carping	carp
carriage	carriag
carriages	carriag
carried	carri

carrier	carrier
carriers	carrier
carries	
carri	
carrion	carrion
carrions	carrion
carry	carri
carrying	carri
cars	car
cart	cart
carters	carter
carthage	carthag
carts	cart
carv	carv
carve	carv
carved	carv
carver	carver
carves	carv
carving	carv
cas	ca
casa	casa
casaer	casaer
casca	casca
case	case
casement	casement
casements	casement
cases	case
cash	cash
cashier	cashier
casing	case
cask	cask
casket	casket
casketed	casket
caskets	casket
casque	casqu
casques	casqu
cassado	cassado
cassandra	cassandra
cassibelan	cassibelan
cassio	cassio
cassius	cassiu
cassocks	cassock
cast	cast
castalion	castalion
castaway	castawai
castaways	castawai
casted	cast
caster	caster

castigate	castig
castigation	castig
castile	castil
castiliano	castiliano
casting	cast
castle	castl
castles	castl
casts	cast
casual	casual
casually	casual
casualties	casualti
casualty	casualti
cat	cat
cataian	cataian
catalogue	catalogu
cataplasm	cataplasm
cataracts	cataract
catarrhs	catarrh
catastrophe	
catastroph	
catch	catch
catcher	catcher
catches	catch
catching	catch
cate	cate
catechising	catechis
catechism	catech
catechize	catech
cater	cater
caterpillars	caterpillar
caters	cater
caterwauling	caterwaul
cates	cate
catesby	catesbi
cathedral	cathedr
catlike	catlik
catling	catl
catlings	catl
cato	cato
cats	cat
cattle	cattl
caucasus	caucasu
caudle	caudl
cauf	cauf
caught	caught
cauldron	cauldron
caus	cau
cause	caus

caused	caus
causeless	causeless
causer	causer
causes	caus
causest	causest
causeth	causeth
cautel	cautel
cautelous	cautel
cautels	cautel
cauterizing	cauter
caution	caution
cautions	caution
cavaleiro	cavaleiro
cavalery	cavaleri
cavaliers	cavali
cave	cave
cavern	cavern
caverns	cavern
caves	cave
caveto	caveto
caviary	caviari
cavil	cavil
cavilling	cavil
cawdor	cawdor
cawdron	cawdron
cawing	caw
ce	ce
ceas	cea
cease	ceas
ceases	ceas
ceaseth	ceaseth
cedar	cedar
cedars	cedar
cedius	cediu
celebrate	
celebr	
celebrated	celebr
celebrates	celebr
celebration	celebr
celerity	celer
celestial	celesti
celia	celia
cell	cell
cellar	cellar
cellarage	cellarag
celsa	celsa
cement	cement
censer	censer

censor	censor
censorinus	censorinu
censur	censur
censure	censur
censured	censur
censurers	censur
censures	censur
censuring	censur
centaur	centaur
centaurs	centaur
centre	centr
cents	cent
centuries	centuri
centurion	centurion
centurions	centurion
century	centuri
cerberus	cerberu
cerecloth	cerecloth
cerements	
cerement	
ceremonial	ceremoni
ceremonies	ceremoni
ceremonious	ceremoni
ceremoniously	ceremoni
ceremony	ceremoni
ceres	cere
cerns	cern
certain	certain
certainer	certain
certainly	certainli
certainties	certainti
certainty	certainti
certes	cert
certificate	certif
certified	certifi
certifies	certifi
certify	certifi
ces	ce
cesario	cesario
cess	cess
cesse	cess
cestern	cestern
cetera	cetera
cette	cett
chaces	chace
chaf	chaf
chafe	chafe
chafed	chafe

chafes	chafe
chaff	chaff
chaffless	
chaffless	
chafing	chafe
chain	chain
chains	chain
chair	chair
chairs	chair
chalic	chalic
chalice	chalic
chalices	chalic
chalk	chalk
chalks	chalk
chalky	chalki
challeng	challeng
challenge	challeng
challenged	challeng
challenger	challeng
challengers	challeng
challenges	challeng
cham	cham
chamber	chamber
chamberers	chamber
chamberlain	chamberlain
chamberlains	chamberlain
chambermaid	chambermaid
chambermaids	chambermaid
chambers	chamber
chameleon	chameleon
champ	champ
champagne	champagn
champain	champain
champains	
champain	
champion	champion
champions	champion
chanc	chanc
chance	chanc
chanced	chanc
chancellor	chancellor
chances	chanc
chandler	chandler
chang	chang
change	chang
changeable	changeabl
changed	chang
changeful	chang

changeling	changel
changelings	changel
changer	changer
changes	chang
changest	changest
changing	chang
channel	channel
channels	channel
chanson	chanson
chant	chant
chanticleer	chanticl
chanting	chant
chantries	chantri
chantry	chantri
chants	chant
chaos	chao
chap	chap
chape	
chape	
chapel	chapel
chapeless	chapeless
chapels	chapel
chaplain	chaplain
chaplains	chaplain
chapless	chapless
chaplet	chaplet
chapmen	chapmen
chaps	chap
chapter	chapter
character	charact
charactered	charact
characterless	characterless
characters	charact
characterly	characteri
characts	charact
charbon	charbon
chare	chare
chares	chare
charg	charg
charge	charg
charged	charg
chargeful	charg
charges	charg
chargeth	chargeth
charging	charg
chariest	chariest
chariness	chari
charing	chare

chariot	chariot
chariots	
chariot	
charitable	charit
charitably	charit
charities	chariti
charity	chariti
charlemain	charlemain
charles	charl
charm	charm
charmed	charm
charmer	charmer
charmeth	charmeth
charmian	charmian
charming	charm
charmingly	charmingli
charms	charm
charneco	charneco
charnel	charnel
charolois	charoloi
charon	charon
charter	charter
charters	charter
chartreux	chartreux
chary	chari
charybdis	charybdi
chas	cha
chase	chase
chased	chase
chaser	chaser
chaseth	chaseth
chasing	chase
chaste	chast
chastely	chast
chastis	chasti
chastise	chastis
chastised	chastis
chastisement	chastis
chastity	chastiti
chat	chat
chatham	chatham
chatillon	chatillon
chats	chat
chatt	chatt
chattels	chattel
chatter	chatter
chattering	chatter
chattles	chattl

chaud	chaud
chaunted	chaunt
chaw	chaw
chawdron	chawdron
che	che
cheap	cheap
cheapen	cheapen
cheaper	cheaper
cheapest	cheapest
cheaply	cheapli
cheapside	cheapsid
cheat	cheat
cheated	cheat
cheater	cheater
cheaters	cheater
cheating	cheat
cheats	cheat
check	check
checked	check
checker	checker
checking	check
checks	check
cheek	cheek
cheeks	cheek
cheer	cheer
cheered	cheer
cheerer	cheerer
cheerful	cheer
cheerfully	cheerfulli
cheering	cheer
cheerless	cheerless
cheerly	cheerli
cheers	cheer
cheese	chees
chequer	chequer
cher	cher
cherish	cherish
cherished	cherish
cherisher	cherish
cherishes	cherish
cherishing	cherish
cherries	cherri
cherry	cherri
cherrypit	cherrypit
chertsey	chertsei
cherub	cherub
cherubims	cherubim

cherubin	cherubin
cherubins	cherubin
cheshu	cheshu
chess	chess
chest	chest
chester	chester
chestnut	chestnut
chestnuts	chestnut
chests	chest
chetas	cheta
chev	chev
cheval	cheval
chevalier	chevali
chevaliers	chevali
cheveril	cheveril
chew	chew
chewed	chew
chewet	chewet
chewing	chew
chez	chez
chi	chi
chick	chick
chicken	chicken
chickens	chicken
chicurmurco	chicurmurco
chid	chid
chidden	chidden
chide	chide
chiders	chider
chides	chide
chiding	chide
chief	
	chief
chiefest	chiefest
chiefly	chiefli
chien	chien
child	child
childed	child
childeric	childer
childhood	childhood
childhoods	childhood
childing	child
childish	childish
childishness	childish
childlike	childlik
childness	child
children	children
chill	chill

chilling	chill
chime	chime
chimes	chime
chimney	chimnei
chimneypiece	chimneypiec
chimneys	chimnei
chimurcho	chimurcho
chin	chin
china	china
chine	chine
chines	chine
chink	chink
chinks	chink
chins	chin
chipp	chipp
chipper	
	chipper
chips	chip
chiron	chiron
chirping	chirp
chirrah	chirrah
chirurgeonly	chirurgeonli
chisel	chisel
chitopher	chitoph
chivalrous	chivalr
chivalry	chivalri
choice	choic
choicely	choic
choicest	choicest
choir	choir
choirs	choir
chok	chok
choke	choke
choked	choke
chokes	choke
choking	choke
choler	choler
choleric	choler
cholers	choler
chollors	chollor
choose	choos
chooser	chooser
chooses	choos
chooseth	chooseth
choosing	choos
chop	chop
chopine	chopin
choplogic	

choplog	
chopp	chopp
chopped	chop
chopping	chop
choppy	choppi
chops	chop
chopt	chopt
chor	chor
choristers	chorist
chorus	choru
chose	chose
chosen	chosen
chough	chough
choughs	chough
chrish	chrish
christ	christ
christen	christen
christendom	christendom
christendoms	christendom
christening	christen
christenings	christen
christian	christian
christianlike	christianlik
christians	christian
christmas	christma
christom	christom
christopher	christoph
christophero	christophero
chronicle	chronicl
chronicled	chronicl
chronicler	
chronicl	
chroniclors	chronicl
chronicles	chronicl
chrysolite	chrysolit
chuck	chuck
chucks	chuck
chud	chud
chuffs	chuff
church	church
churches	church
churchman	churchman
churchmen	churchmen
churtyard	churtyard
churtyards	churtyard
churl	churl
churlish	churlish
churlishly	churlishli

churls	churl
churn	churn
chus	chu
cicatrice	cicatric
cicatrices	cicatric
cicely	cice
cicero	cicero
ciceter	cicet
ciel	ciel
ciitzens	ciitzen
cilicia	cilicia
cimber	cimber
cimmerian	cimmerian
cinable	cinabl
cincture	
cinctur	
cinders	cinder
cine	cine
cinna	cinna
cinque	cinqu
cipher	cipher
ciphers	cipher
circa	circa
circe	circ
circle	circl
circled	circ
circlets	circlet
circling	circ
circuit	circuit
circum	circum
circumcised	circumcis
circumference	circumfer
circummur	circummur
circumscrib	circumscrib
circumscribed	circumscrib
circumscription	circumscript
circumspect	circumspect
circumstance	circumst
circumstanced	circumstanc
circumstances	circumst
circumstantial	circumstanti
circumvent	circumv
circumvention	circumvent
cistern	cistern
citadel	citadel
cital	
cital	
cite	cite

cited	cite
cites	cite
cities	citi
citing	cite
citizen	citizen
citizens	citizen
cittern	cittern
city	citi
civet	civet
civil	civil
civility	civil
civilly	civilli
clack	clack
clad	clad
claim	claim
claiming	claim
claims	claim
clamb	clamb
clamber	clamber
clammer	clammer
clamor	clamor
clamorous	clamor
clamors	clamor
clamour	clamour
clamours	clamour
clang	clang
clangor	clangor
clap	clap
clapp	clapp
clapped	clap
clapper	clapper
clapping	clap
claps	clap
clare	clare
clarence	clarenc
claret	claret
claribel	claribel
clasp	clasp
clasps	clasp
clatter	clatter
claud	claud
claudio	claudio
claudius	claudiu
clause	claus
claw	claw
clawed	claw
clawing	claw
claws	claw

clay	clai
clays	clai
clean	clean
cleanliest	cleanliest
cleanly	cleanli
cleans	clean
cleanse	cleans
cleansing	cleans
clear	clear
clearer	clearer
clearest	clearest
clearly	clearli
clearness	clear
clears	
clear	
cleave	cleav
cleaving	cleav
clef	clef
cleft	cleft
cleitus	cleitu
clemency	clemenc
clement	clement
cleomenes	cleomen
cleopatpa	cleopatpa
cleopatra	cleopatra
clepeth	clepeth
clept	clept
clerestories	clerestori
clergy	clergi
clergyman	clergyman
clergymen	clergymen
clerk	clerk
clerkly	clerkli
clerks	clerk
clew	clew
client	client
clients	client
cliff	cliff
clifford	clifford
cliffords	clifford
cliffs	cliff
clifton	clifton
climate	climat
climature	climatur
climb	climb
climbed	
climb	
climber	climber

climbeth	climbeth
climbing	climb
climbs	climb
clime	clime
cling	cling
clink	clink
clinking	clink
cliquant	cliquant
clip	clip
clipp	clipp
clipper	clipper
clippeth	clippeth
clipping	clip
clipt	clipt
clitus	clitu
clo	clo
cloak	cloak
cloakbag	cloakbag
cloaks	cloak
clock	clock
clocks	clock
clod	clod
cloddy	cloddi
clodpole	clodpol
clog	clog
clogging	clog
clogs	clog
cloister	cloister
cloistress	cloistress
cloquence	cloquenc
clos	clo
close	close
closed	close
closely	close
closeness	close
closer	closer
closes	close
closest	closest
closet	closet
closing	close
closure	clotur
cloten	cloten
clotens	cloten
cloth	cloth
clothair	clothair
clotharius	clothariu
clothe	cloth
clothes	cloth

clothier	clothier
clothiers	clothier
clothing	cloth
cloths	cloth
clotpoles	clotpol
clotpoll	clotpol
cloud	cloud
clouded	cloud
cloudiness	cloudi
clouds	cloud
cloudy	cloudi
clout	clout
clouted	clout
clouts	
clout	
cloven	cloven
clover	clover
cloves	clove
clovest	clovest
clowder	clowder
clown	clown
clownish	clownish
clowns	clown
cloy	cloi
cloyed	cloi
cloying	cloi
cloyless	cloyless
cloyment	cloyment
cloys	cloi
club	club
clubs	club
cluck	cluck
clung	clung
clust	clust
clusters	cluster
clutch	clutch
clyster	clyster
cneius	cneiu
cnemies	cnemi
co	co
coach	coach
coaches	coach
coachmakers	coachmak
coact	coact
coactive	coactiv
coagulate	coagul

coal	coal
coals	coal
coarse	coars
coarsely	coars
coast	coast
coasting	coast
coasts	coast
coat	coat
coated	coat
coats	coat
cobble	cobbl
cobbled	cobbl
cobbler	cobbler
cobham	cobham
cobloaf	cobloaf
cobweb	cobweb
cobwebs	cobweb
cock	cock
cockatrice	cockatric
cockatrices	cockatric
cockle	cockl
cockled	cockl
cockney	cocknei
cockpit	cockpit
cocks	cock
cocksure	cocksur
coctus	coctu
cocytus	cocytu
cod	cod
codding	cod
codling	codl
codpiece	codpiec
codpieces	codpiec
cods	cod
coelestibus	coelestibu
coesar	coesar
coeur	coeur
coffer	coffer
coffers	coffer
coffin	coffin
coffins	coffin
cog	cog
cogging	cog
cogitation	cogit
cogitations	cogit
cognition	cognit
cognizance	cogniz
cogscomb	cogscomb

cohabitants	cohabit
coher	coher
cohere	coher
coherence	coher
coherent	coher
cohorts	cohort
coif	coif
coign	coign
coil	coil
coin	coin
coinage	coinag
coiner	coiner
coining	coin
coins	coin
col	col
colbrand	colbrand
colchos	colcho
cold	cold
colder	colder
coldest	coldest
coldly	coldli
coldness	cold
coldspur	coldspur
colebrook	colebrook
colic	colic
collar	collar
collars	collar
collateral	collater
colleagued	colleagu
collect	collect
collected	collect
collection	collect
college	colleg
colleges	colleg
collied	colli
collier	collier
colliers	collier
collop	collop
collusion	collus
colme	colm
colmekill	colmekil
coloquintida	coloquintida
color	color
colors	color
colossus	colossu
colour	colour
colourable	

colour	
coloured	colour
colouring	colour
colours	colour
colt	colt
colted	colt
colts	colt
columbine	columbin
columbines	columbin
colville	colvil
com	com
comagene	comagen
comart	comart
comb	comb
combat	combat
combatant	combat
combatants	combat
combated	combat
combating	combat
combin	combin
combine	combin
combined	combin
combless	combless
combustion	combust
come	come
comedian	comedian
comedians	comedian
comedy	comedi
comeliness	comeli
comely	come
comer	comer
comers	comer
comes	come
comest	comest
comet	comet
cometh	cometh
comets	comet
comfect	comfect
comfit	comfit
comfits	comfit
comfort	comfort
comfortable	comfort
comforted	comfort
comforter	comfort
comforting	comfort
comfortless	comfortless

comforts	comfort
comic	comic
comical	comic
coming	come
comings	come
cominius	cominiu
comma	comma
command	command
commande	command
commanded	command
commander	command
commanders	command
commanding	command
commandment	command
commandments	command
commands	command
comme	comm
commenc	commenc
commence	commenc
commenced	commenc
commencement	commenc
commences	commenc
commencing	commenc
commend	commend
commendable	commend
commendation	commend
commendations	commend
commended	commend
commending	commend
commends	commend
comment	comment
commentaries	commentari
commenting	comment
comments	comment
commerce	commerc
commingled	commingl
commiseration	commiser
commission	commiss
commissioners	commission
commissions	commiss
commit	commit
commits	commit
committ	committ
committed	commit
committing	commit
commix	
commix	
commixed	commix

commixtion	commixt
commixture	commixtur
commodious	commodi
commodities	commod
commodity	commod
common	common
commonalty	commonalti
commoner	common
commoners	common
commonly	commonli
commons	common
commonweal	commonw
commonwealth	commonwealth
commotion	commot
commotions	commot
commune	commun
communicat	communicat
communicate	commun
communication	commun
communities	commun
community	commun
comonty	comonti
compact	compact
companies	compani
companion	companion
companions	companion
companionship	companionship
company	compani
compar	
compar	
comparative	compar
compare	compar
compared	compar
comparing	compar
comparison	comparison
comparisons	comparison
compartner	compartn
compass	compass
compasses	compass
compassing	compass
compassion	compass
compassionate	compassion
compeers	compeer
compel	compel
compell	compel
compelled	compel
compelling	compel
compels	compel

compensation	compens
competence	compet
competency	compet
competent	compet
competitor	competitor
competitors	competitor
compil	compil
compile	compil
compiled	compil
complain	complain
complainer	complain
complainest	
complainest	
complaining	complain
complaining	complain
complains	complain
complaint	complaint
complaints	complaint
complement	complement
complements	complement
complete	complet
complexion	complexion
complexioned	complexion
complexions	complexion
complices	complic
complies	compli
compliment	compliment
complimental	compliment
compliments	compliment
complot	complot
complots	complot
complotted	complot
comply	compli
compos	compo
compose	compos
composed	compos
composition	composit
compost	compost
composture	compostur
composure	composur
compound	compound
compounded	compound
compounds	compound
comprehend	comprehend
comprehended	comprehend
comprehends	comprehend
compremises	compremis
compris	compri

comprising	compris
compromis	compromi
compromise	compromis
compt	compt
comptible	comptibl
comptrollers	comptrol
compulsatory	compulsatori
compulsion	compuls
compulsive	compuls
compunctious	compuncti
computation	comput
comrade	comrad
comrades	comrad
comutual	comutu
con	con
concave	concav
concavities	concav
conceal	conceal
concealed	conceal
concealing	conceal
concealment	conceal
concealments	conceal
conceals	conceal
conceit	
conceit	
conceited	conceit
conceitless	conceitless
conceits	conceit
conceiv	conceiv
conceive	conceiv
conceived	conceiv
conceives	conceiv
conceiving	conceiv
conception	concept
conceptions	concept
conceptious	concepti
concern	concern
concernancy	concern
concerneth	concerneth
concerning	concern
concernings	concern
concerns	concern
conclave	conclav
conclud	conclud
conclude	conclud
concluded	conclud
concludes	conclud
concluding	conclud

conclusion	conclus
conclusions	conclus
concolinel	concolinel
concord	concord
concubine	concubin
concupiscible	concupisc
concupy	
concupi	
concur	concur
concurring	concur
concur	concur
condemn	condemn
condemnation	condemn
condemned	condemn
condemning	condemn
condemns	condemn
condescend	condescend
condign	condign
condition	condit
conditionally	condition
conditions	condit
condole	condol
condolement	condol
condoling	condol
conduce	conduc
conduct	conduct
conducted	conduct
conducting	conduct
conductor	conductor
conduit	conduit
conduits	conduit
conected	conect
coney	conei
confection	confect
confectionary	confectionari
confections	confect
confederacy	confederaci
confederate	confeder
confederates	confeder
confer	confer
conference	confer
conferr	conferr
conferring	confer
confess	confess
confessed	confess
confesses	confess
confesseth	confesseth
confessing	confess

confession	confess
confessions	confess
confessor	confessor
confidence	confid
confident	confid
confidently	confid
confin	confin
confine	confin
confined	confin
confineless	confineless
confiners	confin
confines	confin
confining	confin
confirm	confirm
confirmation	confirm
confirmations	confirm
confirmed	confirm
confirmer	confirm
confirmers	confirm
confirming	confirm
confirmities	confirm
confirms	confirm
confiscate	confisc
confiscated	confisc
confiscation	confisc
confixed	confix
conflict	conflict
conflicting	conflict
conflicts	conflict
confluence	confluenc
conflux	conflux
conform	conform
conformable	conform
confound	confound
confounded	confound
confounding	confound
confounds	confound
confront	confront
confronted	confront
confus	confu
confused	confus
confusedly	confusedli
confusion	confus
confusions	confus
confutation	confut
confutes	confut
congeal	congeal

congealed	congeal
congealment	congeal
congee	conge
conger	
conger	
congest	congest
congied	congi
congratulate	congratul
congreeing	congre
congreeted	congreet
congregate	congreg
congregated	congreg
congregation	congreg
congregations	congreg
congruent	congruent
congruing	congru
conies	coni
conjectural	conjectur
conjecture	conjectur
conjectures	conjectur
conjoin	conjoin
conjoined	conjoin
conjoins	conjoin
conjointly	conjointli
conjunct	conjunct
conjunction	conjunct
conjunctive	conjunct
conjur	conjur
conjurament	conjur
conjurations	conjur
conjure	conjur
conjured	conjur
conjurer	conjur
conjurers	conjur
conjures	
conjur	
conjuring	conjur
conjuro	conjuro
conn	conn
connected	connect
connive	conniv
conqu	conqu
conquer	conquer
conquered	conquer
conquering	conquer
conqueror	conqueror
conquerors	conqueror
conquers	conquer

conquest	conquest
conquests	conquest
conquering	conqur
conrade	conrad
cons	con
consanguineous	consanguin
consanguinity	consanguin
conscienc	conscienc
conscience	conscienc
consciences	conscienc
conscionable	conscion
consecrate	consecr
consecrated	consecr
consecrations	consecr
consent	consent
consented	consent
consenting	consent
consents	
consent	
consequence	consequ
consequences	consequ
consequently	consequ
conserve	conserv
conserved	conserv
conserves	conserv
consider	consid
considerance	consider
considerate	consider
consideration	consider
considerations	consider
considered	consid
considering	consid
considerings	consid
considers	consid
consign	consign
consigning	consign
consist	consist
consisteth	consisteth
consisting	consist
consistory	consistori
consists	consist
consolate	consol
consolation	consol
consonancy	conson
consonant	conson
consort	consort
consorted	consort
consortest	consortest

conspectuities	conspectu
conspir	conspir
conspiracy	conspiraci
conspirant	conspir
conspirator	conspir
conspirators	conspir
conspire	conspir
conspired	conspir
conspirers	conspir
conspires	conspir
conspiring	conspir
constable	constabl
constables	constabl
constance	constanc
constancies	constanc
constancy	constanc
constant	constant
constantine	constantin
constantinople	constantinopl
constantly	constantli
constellation	constel
constitution	constitut
constrain	constrain
constrained	constrain
constraineth	constraineth
constrains	constrain
constraint	constraint
constring	constr
construction	construct
construe	constru
consul	consul
consuls	consul
consulship	consulship
consulships	consulship
consult	consult
consulting	consult
consults	consult
consum	consum
consume	consum
consumed	consum
consumes	consum
consuming	consum
consummate	consumm
consummation	consumm
consumption	consumpt
consumptions	consumpt
contagion	contagion
contagious	contagi

contain	contain
containing	contain
contains	contain
contaminate	contamin
contaminated	contamin
contemn	contemn
contemned	contemn
contemning	contemn
contemns	contemn
contemplate	contempl
contemplation	contempl
contemplative	contempl
contempt	contempt
contemptible	contempt
contempts	contempt
contemptuous	contemptu
contemptuously	contemptu
contend	contend
contended	contend
contending	contend
contendon	contendon
content	content
contenta	contenta
contented	content
contenteth	contenteth
contention	content
contentious	contenti
contentless	contentless
contento	contento
contents	content
contest	contest
contestation	contest
continence	contin
continency	contin
continent	contin
continents	contin
continua	continua
continual	continua
continually	continua
continuance	continua
continuantly	continuantli
continue	
continua	
continue	continua
continued	continua
continuer	continua
continues	continua
continuing	continua

contract	contract
contracted	contract
contracting	contract
contraction	contract
contradict	contradict
contradicted	contradict
contradiction	contradict
contradicts	contradict
contraries	contrari
contrarities	contrarieti
contrariety	contrarieti
contrarious	contrari
contrariously	contrari
contrary	contrari
contre	contr
contribution	contribut
contributors	contributor
contrite	contrit
contriv	contriv
contrive	contriv
contrived	contriv
contriver	contriv
contrives	contriv
contriving	contriv
control	control
controll	control
controller	control
controlling	control
controlment	control
controls	control
controversy	controversi
contumelious	contumeli
contumeliously	contumeli
contumely	contum
contusions	contus
convenience	conveni
conveniences	conveni
conveniency	conveni
convenient	conveni
conveniently	conveni
convented	convent
conventicles	conventicl
convents	convent
convers	conver
conversant	convers
conversation	convers
conversations	convers

converse	convers
conversed	convers
converses	convers
conversing	convers
conversion	convers
convert	convert
converted	convert
convertest	convertest
converting	convert
convertite	convertit
convertites	convertit
converts	convert
convey	convei
conveyance	convey
conveyances	convey
conveyers	convey
conveying	convei
convict	convict
convicted	convict
convince	convinc
convinced	convinc
convinces	convinc
convive	conviv
convocation	convoc
convoy	convoi
convulsions	convuls
cony	coni
cook	cook
cookery	cookeri
cooks	cook
cool	cool
cooled	cool
cooling	cool
cools	cool
coop	coop
coops	coop
cop	cop
copatain	copatain
cope	
cope	
cophetua	cophetua
copied	copi
copies	copi
copious	copiou
copper	copper
copperspur	copperspur
coppice	coppic

copulation	copul
copulatives	copul
copy	copi
cor	cor
coragio	coragio
coral	coral
coram	coram
corambus	corambu
coranto	coranto
corantos	coranto
corbo	corbo
cord	cord
corded	cord
cordelia	cordelia
cordial	cordial
cordis	cordi
cords	cord
core	core
corin	corin
corinth	corinth
corinthian	corinthian
coriolanus	coriolanu
corioli	corioli
cork	
cork	
corky	corki
cormorant	cormor
corn	corn
cornelia	cornelia
cornelius	corneliu
corner	corner
corners	corner
cornerstone	cornerston
cornets	cornet
cornish	cornish
corns	corn
cornuto	cornuto
cornwall	cornwal
corollary	corollari
coronal	coron
coronation	coron
coronet	coronet
coronets	coronet
corporal	corpor
corporals	corpor
corporate	corpor
corpse	corps
corpulent	corpul

correct	correct
corrected	correct
correcting	correct
correction	correct
correctioner	correction
corrects	correct
correspondence	correspond
correspondent	
correspond	
corresponding	correspond
corresponsive	correspon
corrigible	corrig
corrival	corriv
corrivals	corriv
corroborate	corrobor
corrosive	corros
corrupt	corrupt
corrupted	corrupt
corrupter	corrupt
corrupters	corrupt
corruptible	corrupt
corruptibly	corrupt
corrupting	corrupt
corruption	corrupt
corruptly	corruptli
corrupts	corrupt
corse	cors
corse	cors
corslet	corslet
cosmo	cosmo
cost	cost
costard	costard
costermongers	costermong
costlier	costlier
costly	costli
costs	cost
cot	cot
cote	cote
coted	cote
cotsall	cotsal
cotsole	cotsol
cotswold	cotswold
cottage	cottag
cottages	cottag
cotus	cotu
couch	couch
couched	couch

couching	couch
couchings	couch
coude	coud
cough	cough
coughing	cough
could	could
couldst	couldst
coulter	coulter
council	council
councillor	councillor
councils	council
counsel	counsel
counsell	counsel
counsellor	counsellor
counsellors	counsellor
counselor	counselor
counselors	counselor
counsels	counsel
count	count
counted	count
countenanc	countenanc
countenance	counten
countenances	
counten	
counter	counter
counterchange	counterchang
countercheck	countercheck
counterfeit	counterfeit
counterfeited	counterfeit
counterfeiting	counterfeit
counterfeitly	counterfeitli
counterfeits	counterfeit
countermand	countermand
countermands	countermand
countermines	countermin
counterpart	counterpart
counterpoints	counterpoint
counterpois	counterpoi
counterpoise	counterpois
counters	counter
countervail	countervail
countess	countess
countesses	countess
counties	counti
counting	count
countless	countless
countries	countri
countrv	countrv

country	countri
countryman	countryman
countrymen	countrymen
counts	count
county	counti
couper	couper
couple	coupl
coupled	coupl
couplement	couplement
couples	coupl
couplet	couplet
couplets	couplet
cour	cour
courage	courag
courageous	courag
courageously	courag
courages	courag
courier	courier
couriers	courier
couronne	couronn
cours	cour
course	cours
coursed	cours
courser	courser
coursers	courser
courses	cours
coursing	cours
court	court
courted	court
courteous	courteou
courteously	courteous
courtesan	courtesan
courtesies	courtesi
courtesy	courtesi
courtezan	courtezan
courtezans	courtezan
courtier	courtier
courtiers	courtier
courtlike	courtlik
courtly	courtli
courtney	courtnei
courts	court
courtship	courtship
cousin	cousin
cousins	cousin
couterfeit	couterfeit
coutume	coutum
covenant	coven

covenants	coven
covent	covent
coventry	coventri
cover	cover
covered	cover
covering	cover
coverlet	coverlet
covers	cover
covert	covert
covertly	covertli
coverture	covertur
covet	covet
coveted	covet
coveting	covet
covetings	covet
covetous	covet
covetously	covet
covetousness	
covet	
covets	covet
cow	cow
coward	coward
cowarded	coward
cowardice	cowardic
cowardly	cowardli
cowards	coward
cowardship	cowardship
cowish	cowish
cowl	cowl
cowslip	cowslip
cowslips	cowslip
cox	cox
coxcomb	coxcomb
coxcombs	coxcomb
coy	coi
coystrill	coystril
coz	coz
cozen	cozen
cozenage	cozenag
cozened	cozen
cozener	cozen
cozeners	cozen
cozening	cozen
coziers	cozier
crab	crab
crabbed	crab
crabs	crab
crack	crack

cracked	crack
cracker	cracker
crackers	
cracker	
cracking	crack
cracks	crack
cradle	cradl
cradled	cradl
cradles	cradl
craft	craft
crafted	craft
craftied	crafti
craftier	craftier
craftily	craftili
crafts	craft
craftsmen	craftsmen
crafty	crafti
cram	cram
cramm	cramm
cramp	cramp
cramps	cramp
crams	cram
cranking	crank
cranks	crank
cranmer	cranmer
crannied	cranni
crannies	cranni
cranny	cranni
crants	crant
crare	crare
crash	crash
crassus	crassu
crav	crav
crave	crave
craved	crave
craven	craven
cravens	craven
craves	crave
craveth	craveth
craving	crave
crawl	crawl
crawling	crawl
crawls	crawl
craz	craz
crazed	craze
crazy	crazi
creaking	creak
cream	cream

create	creat
created	creat
creates	creat
creating	creat
creation	creation
creator	creator
creature	creatur
creatures	creatur
credence	credenc
credent	credent
credible	credibl
credit	credit
creditor	creditor
creditors	creditor
credo	credo
credulity	credul
credulous	credul
creed	creed
creek	
	creek
creeks	creek
creep	creep
creeping	creep
creeps	creep
crept	crept
crescent	crescent
crescive	cresciv
cressets	cresset
cressid	cressid
cressida	cressida
cressids	cressid
cressy	cressi
crest	crest
crested	crest
crestfall	crestfal
crestless	crestless
crests	crest
cretan	cretan
crete	crete
crevice	crevic
crew	crew
crews	crew
crib	crib
cribb	cribb
cribs	crib
cricket	cricket
crickets	cricket
cried	cri

criedst	criedst
crier	crier
cries	cri
criest	criest
crieth	crieth
crime	crime
crimeful	crime
crimeless	crimeless
crimes	crime
criminal	crimin
crimson	crimson
cringe	cring
cripple	crippl
crisp	crisp
crisped	crisp
crispian	crispian
crispianus	crispianu
crispin	crispin
critic	critic
critical	critic
critics	critic
croak	croak
croaking	croak
croaks	croak
crocodile	crocodil
cromer	cromer
cromwell	cromwel
crone	crone
crook	crook
crookback	crookback
crooked	crook
crooking	crook
crop	crop
cropp	cropp
crosby	
	crosbi
cross	cross
crossed	cross
crosses	cross
crossesst	crossesst
crossing	cross
crossings	cross
crossly	crossli
crossness	cross
crost	crost
crotchets	crotchet
crouch	crouch
crouching	crouch

crow	crow
crowd	crowd
crowded	crowd
crowding	crowd
crowds	crowd
crowflowers	crowflow
crowing	crow
crowkeeper	crowkeep
crown	crown
crowned	crown
crowner	crowner
crownet	crownet
crownets	crownet
crowning	crown
crowns	crown
crows	crow
crudy	crudi
cruel	cruel
cruell	
cruell	
crueller	crueller
cruelly	cruelli
cruels	cruel
cruelty	cruelti
crum	crum
crumble	crumbl
crumbs	crumb
crupper	crupper
crusadoes	crusado
crush	crush
crushed	crush
crushest	crushest
crushing	crush
crust	crust
crusts	crust
crusty	crusti
crutch	crutch
crutches	crutch
cry	cry
crying	cry
crystal	crystal
crystalline	crystallin
crystals	crystal
cub	cub
cubbert	cubbert
cubiculo	cubiculo
cubit	cubit
cubs	cub

cuckold	cuckold
cuckoldly	cuckoldli
cuckolds	cuckold
cuckoo	cuckoo
cucullus	cucullu
cudgel	cudgel
cudgeled	cudgel
cudgell	cudgel
cudgelling	cudgel
cudgels	cudgel
cue	cue
cues	cue
cuff	cuff
cuffs	cuff
cuique	cuiqu
cull	cull
culling	cull
cullion	cullion
cullionly	cullionli
cullions	cullion
culpable	culpabl
culverin	culverin
cum	cum
cumber	cumber
cumberland	cumberland
cunning	cun
cunningly	cunningli
cunnings	cun
cuore	cuor
cup	cup
cupbearer	cupbear
cupboarding	cupboard
cupid	cupid
cupids	cupid
cuppele	
cuppel	
cups	cup
cur	cur
curan	curan
curate	curat
curb	curb
curbed	curb
curbing	curb
curbs	curb
curd	curd
curdied	curdi
curds	curd
cure	cure

cured	cure
cureless	cureless
curer	curer
cures	cure
curfew	curfew
curing	cure
curio	curio
curiosity	curios
curious	curiou
curiously	curious
curl	curl
curled	curl
curling	curl
curls	curl
currance	curranc
currants	currant
current	current
currents	current
currish	currish
curry	curri
curs	cur
curse	curs
cursed	curs
curses	curs
cursies	cursi
cursing	curs
cursorary	cursorari
curst	curst
curster	curster
curstest	curstest
curstness	curst
cursy	cursi
curtail	curtail
curtain	curtain
curtains	curtain
curtal	curtal
curtis	curti
curtle	curtl
curtsied	curtsi
curtsies	curtsi
curtsy	curtsi
curvet	curvet
curvets	curvet
cushes	cush
cushion	cushion
cushions	cushion
custalorum	custalorum
custard	custard

custody	custodi
custom	custom
customary	customari
customed	custom
customer	custom
customers	custom
customs	custom
custure	custur
cut	cut
cutler	cutler
cutpurse	cutpurs
cutpurses	cutpurs
cuts	cut
cutter	cutter
cutting	cut
cuttle	cuttl
cxsar	cxsar
cyclops	cyclop
cydnus	cydnu
cygnet	cygnet
cygnets	cygnet
cym	cym
cymbals	cymbal
cymbeline	cymbelin
cyme	cyme
cynic	cynic
cynthia	cynthia
cypress	cypress
cyriot	cyriot
cyprus	cypru
cyrus	cyru
cytherea	cytherea
d	d
dabbled	dabbl
dace	dace
dad	dad
daedalus	daedalu
daemon	daemon
daff	daff
daffed	daf
daffest	daffest
daffodils	daffodil
dagger	dagger
daggers	dagger
daonet	daonet
daily	daili
daintier	daintier

dainties	dainti
daintiest	daintiest
daintily	daintili
daintiness	dainti
daintry	daintri
dainty	dainti
daisied	daisi
daisies	daisi
daisy	daisi
dale	dale
dalliance	dallianc
dallied	dalli
dallies	dalli
dally	dalli
dallying	dalli
dalmatians	dalmatian
dam	dam
damage	damag
damascus	damascu
damask	
	damask
damasked	damask
dame	dame
dames	dame
damm	damm
damn	damn
damnable	damnabl
damnably	damnabl
damnation	damnati
damned	damn
damns	damn
damoiselle	damoisel
damon	damon
damosella	damosella
damp	damp
dams	dam
damsel	damsel
damsons	damson
dan	dan
danc	danc
dance	danc
dancer	dancer
dances	danc
dancing	danc
dandle	dandl
dandy	dandi
dane	dane
dang	dang

danger	danger
dangerous	danger
dangerously	danger
dangers	danger
dangling	
dangl	
daniel	daniel
danish	danish
dank	dank
dankish	dankish
dankers	dansker
daphne	daphn
dappled	dappl
dapples	dappl
dar	dar
dardan	dardan
dardanian	dardanian
dardanius	dardaniu
dare	dare
dared	dare
dareful	dare
dares	dare
darest	darest
daring	dare
darius	dariu
dark	dark
darken	darken
darkening	darken
darkens	darken
darker	darker
darkest	darkest
darkling	darkl
darkly	darkli
darkness	dark
darling	darl
darlings	darl
darnel	darnel
darraign	
darraign	
dart	dart
darted	dart
darter	darter
dartford	dartford
darting	dart
darts	dart
dash	dash
dashes	dash
dashing	dash

dastard	dastard
dastards	dastard
dat	dat
datchet	datchet
date	date
dated	date
dateless	dateless
dates	date
daub	daub
daughter	daughter
daughters	daughter
daunt	daunt
daunted	daunt
dauntless	dauntless
dauphin	dauphin
daventry	daventry
davy	davi
daw	daw
dawn	dawn
dawning	dawn
daws	daw
day	dai
daylight	
daylight	
days	dai
dazzle	dazzl
dazzled	dazzl
dazzling	dazzl
de	de
dead	dead
deadly	deadli
deaf	deaf
deafing	deaf
deafness	deaf
deafs	deaf
deal	deal
dealer	dealer
dealers	dealer
dealest	dealest
dealing	deal
dealings	deal
deals	deal
dealt	dealt
dean	dean
deanery	deaneri
dear	dear
dearer	dearer
dearest	dearest

dearly	dearli
dearness	dear
dears	dear
dearth	dearth
dearths	dearth
death	death
deathbed	deathb
deathful	
death	
deaths	death
deathsman	deathsman
deathsmen	deathsmen
debarred	debar
debase	debas
debate	debat
debated	debat
debatement	debat
debateth	debateth
debating	debat
debauch	debauch
debile	debil
debility	debil
debitor	debitor
debonair	debonair
deborah	deborah
debosh	debosh
debt	debt
debted	debt
debtor	debtor
debtors	debtor
debts	debt
debuty	debuti
decay	decai
decayed	decai
decayer	decay
decaying	decai
decays	decai
deceas	decea
decease	deceas
deceased	deceas
deceit	
deceit	
deceitful	deceit
deceits	deceit
deceiv	deceiv
deceivable	deceiv
deceive	deceiv
deceived	deceiv

deceiver	deceiv
deceivers	deceiv
deceives	deceiv
deceivest	deceivest
deceiveth	deceiveth
deceiving	deceiv
december	decemb
decent	decent
deceptious	decepti
decerns	decern
decide	decid
decides	decid
decimation	decim
decipher	deciph
deciphers	deciph
decision	decis
decius	deciu
deck	deck
decking	deck
decks	deck
deckt	deckt
declare	declar
declares	declar
declension	declens
declensions	
declens	
declin	declin
decline	declin
declined	declin
declines	declin
declining	declin
decoct	decoct
decorum	decorum
decreas	decrea
decrease	decreas
decreasing	decreas
decree	decre
decreed	decre
decrees	decre
decrepit	decrepit
dedicate	dedic
dedicated	dedic
dedicates	dedic
dedication	dedic
deed	deed
deedless	deedless
deeds	deed
deem	deem

deemed	deem
deep	deep
deeper	deeper
deepest	deepest
deeply	deepli
deeps	deep
deepvow	deepvow
deer	deer
deesse	deess
defac	
	defac
deface	defac
defaced	defac
defacer	defac
defacers	defac
defacing	defac
defam	defam
default	default
defeat	defeat
defeated	defeat
defeats	defeat
defeatures	defeatur
defect	defect
defective	defect
defects	defect
defence	defenc
defences	defenc
defend	defend
defendant	defend
defended	defend
defender	defend
defenders	defend
defending	defend
defends	defend
defense	defens
defensible	defens
defensive	defens
defer	defer
deferr	deferr
defiance	defianc
deficient	defici
defied	
	defi
defies	defi
defil	defil
defile	defil
defiler	defil
defiles	defil

defiling	defil
define	defin
definement	defin
definite	definit
definitive	definit
definitively	definit
deflow	deflow
deflower	deflow
deflowered	deflow
deform	deform
deformed	deform
deformities	deform
deformity	deform
deftly	deftli
defunct	defunct
defunction	defunct
defuse	defus
defy	defi
defying	defi
degenerate	degener
degraded	degrad
degree	degre
degrees	degre
deified	deifi
deifying	deifi
deign	deign
deigned	
deign	
deiphobus	deiphobu
deities	deiti
deity	deiti
deja	deja
deject	deject
dejected	deject
delabreth	delabreth
delay	delai
delayed	delai
delaying	delai
delays	delai
delectable	delect
deliberate	deliber
delicate	delic
delicates	delic
delicious	delici
deliciousness	delici
delight	delight
delighted	delight
delightful	delight

delights	delight
delinquents	delinqu
deliv	deliv
deliver	deliv
deliverance	deliver
delivered	deliv
delivering	deliv
delivers	deliv
delivery	deliveri
delphos	delpho
deluded	
delud	
deluding	delud
deluge	delug
delve	delv
delver	delver
delves	delv
demand	demand
demanded	demand
demanding	demand
demands	demand
demean	demean
demeanor	demeanor
demeanour	demeanour
demerits	demerit
demesnes	demesn
demetrius	demetriu
demi	demi
demigod	demigod
demise	demis
demoiselles	demoisel
demon	demon
demonstrable	demonstr
demonstrate	demonstr
demonstrated	demonstr
demonstrating	demonstr
demonstration	demonstr
demonstrative	demonstr
demure	demur
demurely	demur
demuring	demur
den	den
denay	
denai	
deni	deni
denial	denial
denials	denial
denied	deni

denier	denier
denies	deni
deniest	deniest
denis	deni
denmark	denmark
dennis	denni
denny	denni
denote	denot
denoted	denot
denotement	denot
denounc	denounc
denounce	denounc
denouncing	denounc
dens	den
denunciation	denunci
deny	deni
denying	deni
deo	deo
depart	depart
departed	depart
departest	departest
departing	depart
departure	departur
depeche	depech
depend	depend
dependant	depend
dependants	depend
depended	
depend	
dependence	depend
dependences	depend
dependency	depend
dependent	depend
dependents	depend
depender	depend
depending	depend
depends	depend
deplore	deplor
deploring	deplor
depopulate	depopul
depos	depo
depose	depos
deposed	depos
deposing	depos
depositories	depositari
deprav	deprav
depravation	deprav
deprave	deprav

depraved	deprav
depraves	deprav
depress	depress
depriv	depriv
deprive	depriv
depth	depth
depths	depth
deputation	deput
depute	deput
deputed	deput
deputies	deputi
deputing	
deput	
deputy	deputi
deracinate	deracin
derby	derbi
dercetas	derceta
dere	dere
derides	derid
derision	deris
deriv	deriv
derivation	deriv
derivative	deriv
derive	deriv
derived	deriv
derives	deriv
derogate	derog
derogately	derog
derogation	derog
des	de
desartless	desartless
descant	descant
descend	descend
descended	descend
descending	descend
descends	descend
descension	descens
descent	descent
descents	descent
describe	describ
described	describ
describes	describ
descried	descri
description	descript
descriptions	descript
descry	descri
desdemon	desdemon
desdemonia	desdemonia

desert	desert
deserts	desert
deserv	deserv
deserve	deserv
deserved	deserv
deservedly	deservedli
deserver	deserv
deservers	deserv
deserves	deserv
deservest	deservest
deserving	deserv
deservings	deserv
design	design
designment	design
designments	design
designs	design
desir	desir
desire	desir
desired	desir
desirers	desir
desires	desir
desirest	desirest
desiring	desir
desirous	desir
desist	desist
desk	desk
desolate	desol
desolation	desol
desp	desp
despair	despair
despairing	despair
despairs	despair
despatch	despatch
desperate	desper
desperately	desper
desperation	desper
despis	despi
despise	despis
despised	despis
despiser	despis
despiseth	despiseth
despising	despis
despite	despit
despiteful	despit
despoiled	despoil
dest	dest
destin	destin
destined	destin

destinies	destini
destiny	destini
destitute	destitut
destroy	destrui
destroyed	destrui
destroyer	destroy
destroyers	destroy
destroying	destrui
destroys	destrui
destruction	destruct
destructions	destruct
det	det
detain	detain
detains	detain
detect	detect
detected	detect
detecting	detect
detection	detect
detector	detector
detects	detect
detention	detent
determin	determin
determinate	determin
determination	determin
determinations	determin
determine	determin
determined	determin
determines	determin
detest	detest
detestable	detest
detested	detest
detesting	detest
detests	detest
detract	detract
detraction	detract
detractions	detract
deucalion	deucalion
deuce	deuc
deum	deum
deux	deux
devant	
devant	
devesting	devest
device	devic
devices	devic
devil	devil
devilish	devilish
devils	devil

devis	devi
devise	devis
devised	devis
devises	devis
devising	devis
devoid	devoid
devonshire	devonshir
devote	devot
devoted	devot
devotion	devot
devour	devour
devoured	devour
devourers	devour
devouring	devour
devours	devour
devout	devout
devoutly	devoutli
dew	dew
dewberries	dewberri
dewdrops	dewdrop
dewlap	dewlap
dewlapp	dewlapp
dews	dew
dewy	dewi
dexter	dexter

dexteriously	dexteri
dexterity	dexter
di	di
diable	diabl
diablo	diablo
diadem	diadem
dial	dial
dialect	dialect
dialogue	dialogu
dialogued	dialogu
dials	dial
diameter	diamet
diamond	diamond
diamonds	diamond
dian	dian
diana	diana
diaper	diaper
dibble	dibbl
dic	dic
dice	dice
dicers	dicer
dich	dich

dick	dick
dickens	dicken
dickon	dickon
dicky	dicki
dictator	dictat
diction	diction
dictynna	dictynna
did	did
diddle	diddl
didest	didest
dido	dido
didst	didst
die	die
died	di
diedst	diedst
dies	di
diest	diest
diet	diet
dieted	diet
dieter	dieter
dieu	dieu
diff	diff
differ	differ
difference	differ
differences	differ
differency	differ
different	differ
differing	differ
differs	differ
difficile	difficil
difficult	difficult
difficulties	difficulti
difficulty	difficulti
diffidence	diffid
diffidences	diffid
diffus	diffu
diffused	diffus
diffusest	diffusest
dig	dig
digest	digest
digested	digest
digestion	
digest	
digestions	digest
digg	digg
digging	dig
dighton	dighton
dignified	dignifi

dignifies	dignifi
dignify	dignifi
dignities	digniti
dignity	digniti
digress	digress
digressing	digress
digression	digress
digs	dig
dig	dig
dilate	dilat
dilated	dilat
dilations	dilat
dilatory	dilatori
dild	dild
dildos	dildo
dilemma	dilemma
dilemmas	dilemma
diligence	dilig
diligent	dilig
diluculo	diluculo
dim	dim
dimension	dimens
dimensions	dimens
diminish	diminish
diminishing	diminish
diminution	diminut
diminutive	diminut
diminutives	diminut
dimm	dimm
dimmed	dim
dimming	dim
dimpled	dimpl
dimples	dimpl
dims	dim
din	din
dine	dine
dined	dine
diner	diner
dines	dine
ding	ding
dining	dine
dinner	dinner
dinners	dinner
dinnertime	dinnertim
dint	dint
diomed	diom
diomede	diomed
diomedes	diomed

dion	dion
dip	dip
dipp	dipp
dipping	dip
dips	dip
dir	dir
dire	dire
direct	direct
directed	direct
directing	direct
direction	
direct	
directions	direct
directitude	directitud
directive	direct
directly	directli
directs	direct
direful	dire
direness	dire
direst	direst
dirge	dirg
dirges	dirg
dirt	dirt
dirty	dirty
dis	di
disability	disabl
disable	disabl
disabled	disabl
disabling	disabl
disadvantage	disadvantag
disagree	disagre
disallow	disallow
disanimates	disanim
disannul	disannul
disannuls	disannul
disappointed	disappoint
disarm	disarm
disarmed	disarm
disarmeth	disarmeth
disarms	disarm
disaster	disast
disasters	disast
disastrous	
disastr	
disbench	disbench
disbranch	disbranch
disburdened	disburden
disburs	disbur

disburse	disburs
disbursed	disburs
discandy	discandi
discandying	discandi
discard	discard
discarded	discard
discase	discas
discased	discas
discern	discern
discerner	discern
discerning	discern
discernings	discern
discerns	discern
discharg	discharg
discharge	discharg
discharged	discharg
discharging	discharg
discipled	discipl
disciples	discipl
disciplin	disciplin
discipline	disciplin
disciplined	disciplin
disciplines	disciplin
disclaim	disclaim
disclaiming	disclaim
disclaims	disclaim
disclos	disclo
disclose	disclos
disclosed	disclos
discloses	disclos
discolour	discolour
discoloured	discolour
discolours	discolour
discomfit	discomfit
discomfited	discomfit
discomfiture	discomfitur
discomfort	discomfort
discomfortable	discomfort
discommend	discommend
disconsolate	disconsol
discontent	discont
discontented	discont
discontentedly	discontentedli
discontenting	discont
discontents	discont
discontinue	discontin
discontinued	discontin

discord	discord
discordant	discord
discords	discord
discourse	discours
discoursed	discours
discourser	discours
discourses	discours
discoursive	discours
discourtesy	discourtesi
discov	discov
discover	discov
discovered	discov
discoverers	discover
discoveries	discoveri
discovering	discov
discovers	discov
discovery	discoveri
discredit	discredit
discredited	discredit
discredits	discredit
discreet	discreet
discreetly	discreetli
discretion	discret
discretions	discret
discuss	discuss
disdain	disdain
disdained	disdain
disdaineth	disdaineth
disdainful	disdain
disdainfully	disdainfulli
disdaining	disdain
disdains	disdain
disdnguish	disdnguish
diseas	disea
disease	diseas
diseased	diseas
diseases	
diseas	
disedg	disedg
disembark	disembark
disfigure	disfigur
disfigured	disfigur
disfurnish	disfurnish
disgorge	disgorg
disgrac	disgrac
disgrace	disgrac
disgraced	disgrac

disgraceful	disgrac
disgraces	disgrac
disgracing	disgrac
disgracious	disgraci
disguis	disgui
disguise	disguis
disguised	disguis
disguiser	disguis
disguises	disguis
disguising	disguis
dish	dish
dishabited	dishabit
dishclout	dishclout
dishearten	dishearten
disheartens	dishearten
dishes	dish
dishonest	dishonest
dishonestly	dishonestli
dishonesty	dishonesti
dishonor	dishonor
dishonorable	
dishonor	
dishonors	dishonor
dishonour	dishonour
dishonourable	dishonour
dishonoured	dishonour
dishonours	dishonour
disinherit	disinherit
disinherited	disinherit
disjoin	disjoin
disjoining	disjoin
disjoins	disjoin
disjoint	disjoint
disjunction	disjunct
dislik	dislik
dislike	dislik
disliken	disliken
dislikes	dislik
dislimns	dislimn
dislocate	disloc
dislodg	dislodg
disloyal	disloy
disloyalty	disloyalti
dismal	dismal
dismantle	dismantl
dismantled	dismantl
dismask	dismask
dismay	dismai

dismayed	dismai
dismemb	dismemb
dismember	dismemb
dismes	
dism	
dismiss	dismiss
dismissed	dismiss
dismissing	dismiss
dismission	dismiss
dismount	dismount
dismounted	dismount
disnatur	disnatur
disobedience	disobedi
disobedient	disobedi
disobey	disobei
disobeys	disobei
disorb	disorb
disorder	disord
disordered	disord
disorderly	disorderli
disorders	disord
disparage	disparag
disparagement	disparag
disparagements	disparag
dispark	dispark
dispatch	dispatch
dispensation	dispens
dispense	dispens
dispenses	dispens
dispers	dispers
disperse	dispers
dispersed	dispers
dispersedly	dispersedli
dispersing	dispers
dispiteous	
dispit	
displac	displac
displace	displac
displaced	displac
displant	displant
displanting	displant
display	displai
displayed	displai
displeas	displea
displease	displeas
displeased	displeas
displeasing	displeas
displeasure	displeasur

displeasures	displeasur
disponge	dispong
disport	disport
disports	disport
dispos	dispo
dispose	dispos
disposed	dispos
disposer	dispos
disposing	dispos
disposition	disposit
dispositions	disposit
dispossess	dispossess
dispossessing	dispossess
disprais	disprai
dispraise	disprais
dispraising	disprais
dispraisingly	dispraisingli

dispropertied	disproperti
disproportion	disproport
disproportioned	disproport
disprov	disprov
disprove	disprov
disproved	disprov
dispursed	dispurs
disputable	disput
disputation	disput
disputations	disput
dispute	disput
disputed	disput
disputes	disput
disputing	disput
disquantity	disquant
disquiet	disquiet
disquietly	disquietli
disrelish	disrelish
disrobe	disrob
disseat	disseat
dissemble	dissembl
dissembled	dissembl
dissembler	dissembl
dissemblers	dissembl
dissembling	dissembl
dissembly	dissembl
dissension	dissens
dissensions	dissens
dissentious	dissenti
dissever	dissev

dissipation	dissip
dissolute	dissolut
dissolutely	dissolut
dissolution	dissolut
dissolutions	dissolut
dissolv	dissolv
dissolve	dissolv
dissolved	dissolv
dissolves	dissolv
dissuade	dissuad
dissuaded	dissuad
distaff	distaff
distaffs	distaff
distain	distain
distains	distain
distance	distanc
distant	distant
distaste	distast
distasted	distast
distasteful	distast
distemp	distemp
distemper	distemp
distemperature	distemperatur
distemperatures	distemperatur
distempered	distemp
distempering	distemp
distil	distil
distill	distil
distillation	distil
distilled	distil
distills	distil
distilment	distil
distinct	distinct
distinction	distinct
distinctly	distinctli
distingue	distingu
distinguish	distinguish
distinguishes	distinguish
distinguishment	distinguish
distract	distract
distracted	distract
distractedly	distractedli
distractation	distract
distractions	distract
distracts	distract
distrain	distrain
distraught	distraught
distress	distress

distressed	distress
distresses	distress
distressful	distress
distribute	distribut
distributed	distribut
distribution	distribut
distrust	distrust
distrustful	distrust
disturb	disturb
disturbed	disturb
disturbers	disturb
disturbing	disturb
disunite	disunit
disvalued	disvalu
disvouch	disvouch
dit	dit
ditch	ditch
ditchers	ditcher
ditches	ditch
dites	dite
ditties	ditti
ditty	ditti
diurnal	diurnal
div	div
dive	dive
diver	diver
divers	diver
diversely	divers
diversity	divers
divert	divert
diverted	divert
diverts	divert
dives	dive
divest	divest
dividable	divid
dividant	divid
divide	divid
divided	divid
divides	divid
divideth	divideth
divin	divin
divination	divin
divine	
divin	
divinely	divin
divineness	divin
diviner	divin
divines	divin

divinest	divinest
divining	divin
divinity	divin
division	divis
divisions	divis
divorc	divorc
divorce	divorc
divorced	divorc
divorcement	divorc
divorcing	divorc
divulg	divulg
divulge	divulg
divulged	divulg
divulging	divulg
dizy	dizi
dizzy	dizzi
do	do
doating	doat
dobbin	dobbin
dock	dock
docks	dock
doct	doct
doctor	doctor
doctors	doctor
doctrine	doctrin
document	document
dodge	dodg
doe	
doe	
doer	doer
doers	doer
does	doe
doest	doest
doff	doff
dog	dog
dogberry	dogberri
dogfish	dogfish
dogg	dogg
dogged	dog
dogs	dog
doigts	doigt
doing	do
doings	do
doit	doit
doits	doit
dolabella	dolabella
dole	dole
doleful	dole

doll	doll
dollar	dollar
dollars	dollar
dolor	dolor
dolorous	dolor
dolour	dolour
dolours	dolour
dolphin	dolphin
dolt	dolt
dolts	dolt
domestic	domest
domestics	domest
dominance	domin
dominations	
domin	
dominator	domin
domine	domin
domineer	domin
domineering	domin
dominical	domin
dominion	dominion
dominions	dominion
domitius	domitiu
dommelton	dommelton
don	don
donalbain	donalbain
donation	donat
donc	donc
doncaster	doncast
done	done
dong	dong
donn	donn
donne	donn
donner	donner
donnerai	donnerai
doom	doom
doomsday	doomsdai
door	door
doorkeeper	doorkeep
doors	door
dorcas	dorca
doreus	doreu
doricles	doricl
dormouse	dormous
dorothy	dorothi
dorset	
dorset	
dorsetshire	dorsetshir

dost	dost
dotage	dotag
dotant	dotant
dotard	dotard
dotards	dotard
dote	dote
doted	dote
doters	doter
dotes	dote
doteth	doteth
doth	doth
doting	dote
double	doubl
doubled	doubl
doubleness	doubl
doubler	doubler
doublet	doublet
doublets	doublet
doubling	doubl
doubly	doubli
doubt	doubt
doubted	doubt
doubtful	doubt
doubtfully	doubtfulli
doubting	doubt
doubtless	doubtless
doubts	doubt
doug	doug
dough	dough
doughty	doughti
doughy	
	doughi
douglas	dougla
dout	dout
doute	dout
douts	dout
dove	dove
dovehouse	dovehous
dover	dover
doves	dove
dow	dow
dowager	dowag
dowdy	dowdi
dower	dower
dowerless	dowerless
dowers	dower
dowlas	dowla
dowle	dowl

down	down
downfall	downfal
downright	downright
downs	down
downstairs	downstair
downtrod	downtrod
downward	downward
downwards	downward
downy	downi
dowries	dowri
dowry	dowri
dowsabel	dowsabel
doxy	doxi
dozed	doze
dozen	dozen
dozens	dozen
dozy	dozi
drab	drab
drabbing	drab
drabs	drab
drachma	drachma
drachmas	drachma
draff	draff
drag	drag
dragg	dragg
dragged	drag
dragging	drag
dragon	dragon
dragonish	dragonish
dragons	dragon
drain	drain
drained	drain
drains	drain
drake	drake
dram	dram
dramatis	dramati
drank	drank
draught	draught
draughts	draught
drave	drave
draw	draw
drawbridge	drawbridg
drawer	drawer
drawers	drawer
draweth	draweth
drawing	draw
drawling	

drawl	
drawn	drawn
draws	draw
drayman	drayman
draymen	draymen
dread	dread
dreaded	dread
dreadful	dread
dreadfully	dreadfulli
dreading	dread
dreads	dread
dream	dream
dreamer	dreamer
dreamers	dreamer
dreaming	dream
dreams	dream
dreamt	dreamt
drearning	drearn
dreary	dreari
dreg	dreg
dregs	dreg
drench	drench
drenched	drench
dress	dress
dressed	dress
dresser	dresser
dressing	dress
dressings	dress
drest	drest
drew	drew
dribbling	dribbl
dried	dri
drier	
drier	
dries	dri
drift	drift
drily	drili
drink	drink
drinketh	drinketh
drinking	drink
drinkings	drink
drinks	drink
driv	driv
drive	drive
drivelling	drivel
driven	driven
drives	drive
driveth	driveth

driving	drive
drizzle	drizzl
drizzled	drizzl
drizzles	drizzl
droit	droit
drollery	drolleri
dromio	dromio
dromios	dromio
drone	drone
drones	drone
droop	droop
droopeth	droopeth
drooping	droop
droops	droop
drop	drop
dropheir	dropheir
droplets	droplet
dropp	
	dropp
dropper	dropper
droppeth	droppeth
dropping	drop
droppings	drop
drops	drop
dropsied	dropsi
dropsies	dropsi
dropsy	dropsi
dropt	dropt
dross	dross
drossy	drossi
drought	drought
drove	drove
droven	droven
drovier	drovier
drown	drown
drowned	drown
drowning	drown
drowns	drown
drows	drow
drowse	drows
drowsily	drowsili
drowsiness	drowsi
drowsy	drowsi
drudge	drudg
drudgery	drudgeri
drudges	drudg
drug	drug
drugg	drugg

drugs	drug
drum	drum
drumble	drumbl
drummer	drummer
drumming	drum
drums	drum
drunk	drunk
drunkard	drunkard
drunkards	drunkard
drunken	drunken
drunkenly	drunkenli
drunkenness	drunken
dry	dry
dryness	dryness
dst	dst
du	du
dub	dub
dubb	dubb
ducat	ducat
ducats	ducat
ducdame	ducdam
duchess	duchess
duchies	duchi
duchy	duchi
duck	duck
ducking	duck
ducks	duck
dudgeon	dudgeon
due	due
duellist	duellist
duello	duello
duer	duer
dues	due
duff	duff
dug	dug
dugs	dug
duke	duke
dukedom	dukedom
dukedoms	dukedom
dukes	duke
dulcet	dulcet
dulche	dulch
dull	dull
dullard	dullard
duller	duller
dullest	dullest
dulling	dull
dullness	dull

dulls	dull
dully	dulli
dulness	dul
duly	duli
dumain	dumain
dumb	dumb
dumbe	dumb
dumbly	dumbl
dumbness	dumb
dump	dump
dumps	dump
dun	dun
duncan	duncan
dung	dung
dungeon	dungeon
dungeons	dungeon
dunghill	dunghil
dunghills	dunghil
dungy	
	dungi
dunnest	dunnest
dunsinane	dunsinan
dunsmore	dunsmor
dunstable	dunstabl
dupp	dupp
durance	duranc
during	dure
durst	durst
dusky	duski
dust	dust
dusted	dust
dusty	dusti
dutch	dutch
dutchman	dutchman
duteous	duteou
duties	duti
dutiful	duti
duty	duti
dwarf	dwarf
dwarfish	dwarfish
dwell	dwell
dwellers	dwell
dwelling	dwell
dwells	dwell
dwelt	dwelt
dwindle	dwindl
dy	dy
dye	dye

dyed	dy
dyer	dyer
dying	dy
e	
e	
each	each
eager	eager
eagerly	eagerli
eagerness	eager
eagle	eagl
eagles	eagl
eaning	ean
eanlings	eanl
ear	ear
earring	ear
earl	earl
earldom	earldom
earlier	earlier
earliest	earliest
earliness	earli
earls	earl
early	earli
earn	earn
earned	earn
earnest	earnest
earnestly	earnestli
earnestness	earnest
earns	earn
ears	ear
earth	earth
earthen	earthen
earthlier	earthlier
earthly	earthli
earthquake	earthquak
earthquakes	earthquak
earthy	earthi
eas	
ea	
ease	eas
eased	eas
easeful	eas
eases	eas
easier	easier
easiest	easiest
easiliest	easiliest
easily	easili
easiness	easi
easing	eas

east	east
eastcheap	eastcheap
easter	easter
eastern	eastern
eastward	eastward
easy	easi
eat	eat
eaten	eaten
eater	eater
eaters	eater
eating	eat
eats	eat
eaux	eaux
eaves	eav
ebb	ebb
ebbing	eb
ebbs	ebb
ebon	ebon
ebony	eboni
ebrew	ebrew
ecce	ecc
echapper	echapp

echo	echo
echoes	echo
eclips	eclip
eclipse	eclips
eclipses	eclips
ecolier	ecoli
ecoutez	ecoutez
ecstacy	ecstaci
ecstasies	ecstasi
ecstasy	ecstasi
ecus	ecu
eden	eden
edg	edg
edgar	edgar
edge	edg
edged	edg
edgeless	edgeless
edges	edg
edict	edict
edicts	edict
edifice	edific
edifices	edific
edified	edifi
edifies	edifi
edition	edit

edm	edm
edmund	edmund
edmunds	edmund
edmundsbury	edmundsburi
educate	educ
educated	educ
education	educ
edward	
	edward
eel	eel
eels	eel
effect	effect
effected	effect
effectless	effectless
effects	effect
effectual	effectu
effectually	effectu
effeminate	effemin
effigies	effigi
effus	effu
effuse	effus
effusion	effus
eftest	eftest
egal	egal
egally	egal
eget	eget
egeus	egeu
egg	egg
eggs	egg
eggshell	eggshel
eglamour	eglamour
eglantine	eglantin
egma	egma
ego	ego
egregious	egregi
egregiously	egregi
egress	egress
egypt	egypt
egyptian	egyptian
egyptians	egyptian
eie	eie
eight	eight
eighteen	eighteen
eighth	eighth
eightpenny	eightpenni
eighty	eighti
eisel	eisel
either	either

eject	eject
eke	ek
el	el
elbe	elb
elbow	elbow
elbows	elbow
eld	eld
elder	elder
elders	elder
eldest	eldest
eleanor	eleanor
elect	elect
elected	elect
election	elect
elegancy	eleg
elegies	elegi
element	element
elements	element
elephant	eleph
elephants	eleph
elevated	elev
eleven	eleven
eleventh	eleventh
elf	elf
elflocks	elflock
eliads	eliad
elinor	elinor
elizabeth	elizabeth
ell	ell
elle	ell
ellen	ellen
elm	elm
eloquence	eloqu
eloquent	eloqu
else	els
elsewhere	elsewher
elsinore	elsinor
eltham	eltham
elves	elv
elvish	elvish
ely	eli
elysium	elysium
em	em
emballing	embal
embalm	embalm
embalms	embalm
embark	embark
embarked	embark

embarquements	embarqu
embassade	embassad
embassage	embassag
embassies	embassi
embassy	embassi
embattailed	embattail
embattl	embattl
embattle	
embattl	
embay	embai
embellished	embellish
embers	ember
emblaze	emblaz
emblem	emblem
emblems	emblem
embodied	embodi
embold	embold
emboldens	embolden
emboss	emboss
embossed	emboss
embounded	embound
embowel	embowel
embowell	embowel
embrac	embrac
embrace	embrac
embraced	embrac
embracement	embrac
embracements	embrac
embraces	embrac
embracing	embrac
embrasures	embrasur
embroider	embroid
embroidery	embroideri
emhracing	emhrac
emilia	emilia
eminence	emin
eminent	emin
eminently	emin
emmanuel	emmanuel
emnity	
emniti	
empale	empal
emperal	emper
emperess	emperess
emperial	emper
emperor	emperor
empery	emper
emphasis	emphasi

empire	empir
empirics	empir
empiricute	empiricut
empleached	empleach
employ	emploi
employed	emploi
employer	employ
employment	employ
employments	employ
empoison	empoison
empress	empress
emptied	empti
emptier	emptier
empties	empti
emptiness	empti
empty	empti
emptying	empti
emulate	emul
emulation	emul
emulations	emul
emulator	emul
emulous	emul
en	en
enact	enact
enacted	enact
enacts	enact
enactures	enactur
enamell	enamel
enamelled	enamel
enamour	enamour
enamoured	enamour
enanmour	enanmour
encamp	encamp
encamped	encamp
encave	encav
enceladus	enceladu
enchaf	enchaf
enchafed	enchaf
enchant	enchant
enchanted	enchant
enchancing	enchant
enchantingly	enchantingli
enchantment	enchant
enchantress	enchantress
enchants	enchant
enchas	encha
encircle	encircl
encircled	encircl

enclos	enclo
enclose	enclos
enclosed	enclos
encloses	enclos
encloseth	encloseth
enclosing	enclos
enclouded	
encloud	
encompass	encompass
encompassed	encompass
encompasseth	encompasseth
encompassment	encompass
encore	encor
encorporal	encorpor
encount	encount
encounter	encount
encountered	encount
encounters	encount
encourage	encourag
encouraged	encourag
encouragement	encourag
encrimsoned	encrimson
encroaching	encroach
encumb	encumb
end	end
endamage	endamag
endamagement	endamag
endanger	endang
endart	endart
endear	endear
endeared	endear
endeavour	endeavour
endeavours	endeavour
ended	end
ender	ender
ending	end
endings	end
endite	endit
endless	endless
endow	endow
endowed	endow
endowments	endow
endows	endow
ends	end
endu	endu
endue	endu
endur	endur
endurance	endur

endure	endur
endured	endur
endures	endur
enduring	endur
endymion	endymion
eneas	enea
enemies	enemi
enemy	enemi
enemies	enemi
enew	enew
enfeebled	enfeebled
enfeebles	enfeebled
enfeoff	enfeoff
enfetter	enfetter
enfoldings	enfold
enforc	enforc
enforce	enforc
enforced	enforc
enforcedly	enforcedly
enforcement	enforc
enforces	enforc
enforcest	
enforcest	
enfranchised	enfranch
enfranchises	enfranch
enfranchise	enfranch
enfranchised	enfranch
enfranchisement	enfranch
enfreed	enfre
enfreedoming	enfreedom
engag	engag
engage	engag
engaged	engag
engagements	engag
engaging	engag
engaol	engaol
engend	engend
engender	engend
engenders	engend
engilds	engild
engine	engin
engineer	engin
engineer	engin
engines	engin
engirt	engirt
england	england
english	english
englishman	englishman

englishmen	englishmen
engluts	englut
englutted	englut
engraffed	engraf
engraft	engraft
engrafted	engraft
engrav	engrav
engrave	engrav
engross	engross
engrossed	engross
engrossest	engrossest
engrossing	engross
engrossments	engross
enguard	enguard
enigma	enigma
enigmatical	enigmat
enjoin	enjoin
enjoined	enjoin
enjoy	enjoi
enjoyed	enjoi
enjoyer	enjoy
enjoying	enjoi
enjoys	enjoi
enkindle	enkindl
enkindled	enkindl
enlard	enlard
enlarg	enlarg
enlarge	enlarg
enlarged	enlarg
enlargement	enlarg
enlargeth	enlargeth
enlighten	enlighten
enlink	enlink
enmesh	enmesh
enmities	enmiti
enmity	enmiti
ennoble	ennobl
ennobled	ennobl
enobarb	enobarb
enobarbus	enobarbu
enon	enon
enormity	enorm
enormous	enorm
enough	enough
enow	enow
enpatron	enpatron
enpierced	enpierc

enquir	enquir
enquire	enquir
enquired	enquir
enrag	enrag
enrage	enrag
enraged	enrag
enrages	enrag
enrank	enrank
enrapt	enrapt
enrich	enrich
enriched	enrich
enriches	enrich
enridged	enridg
enrings	enr
enrob	enrob
enrobe	enrob
enroll	enrol
enrolled	enrol
enrooted	enroot
enrounded	enround
enschedul	
enschedul	
ensconce	ensconce
ensconcing	ensconce
enseamed	enseam
ensear	ensear
enseigne	enseign
enseignez	enseignez
ensemble	ensembl
enshelter	enshelt
enshielded	enshield
enshrines	enshrin
ensign	ensign
ensigns	ensign
enski	enski
ensman	ensman
ensnare	ensnar
ensnared	ensnar
ensnareth	ensnareth
ensteep	ensteep
ensu	ensu
ensue	ensu
ensued	ensu
ensues	ensu
ensuing	ensu
enswathed	enswath
ent	ent
entail	entail

entame	entam
entangled	entangl
entangles	entangl
entendre	entendr
enter	
enter	
entered	enter
entering	enter
enterprise	enterpris
enterprises	enterpris
enters	enter
entertain	entertain
entertained	entertain
entertainer	entertain
entertaining	entertain
entertainment	entertain
entertainments	entertain
enthrall	enthrall
enthralled	enthrall
enthron	enthron
enthroned	enthron
entice	entic
enticements	entic
enticing	entic
entire	entir
entirely	entir
entitle	entitl
entitled	entitl
entitling	entitl
entomb	entomb
entombed	entomb
entrails	entrail
entrance	entranc
entrances	entranc
entrap	entrap
entrapp	entrapp
entre	entr
entreat	entreat
entreated	entreat
entreaties	entreati
entreating	entreat
entreatments	entreat
entreats	entreat
entreaty	entreati
entrench	entrench
entry	entri
entwist	entwist
envelop	envelop

envenom	envenom
envenomed	envenom
envenoms	envenom
envied	envi
envies	envi
envious	enviou
enviously	envious
environ	environ
environed	environ
envoy	envoi
envy	envi
envying	envi
enwheel	enwheel
enwombed	enwomb
enwraps	enwrap
ephesian	ephesian
ephesians	ephesian
ephesus	ephesu
epicure	epicur
epicurean	epicurean
epicures	epicur
epicurism	epicur
epicurus	epicuru
epidamnum	epidamnum
epidaurus	epidauru
epigram	epigram
epilepsy	epilepsi
epileptic	epilept
epilogue	epilogu
epilogues	epilogu
epistles	epistl
epistrophus	epistrophu
epitaph	epitaph
epitaphs	epitaph
epithet	epithet
epitheton	epitheton
epithets	epithet
epitome	epitom
equal	equal
equalities	equal
equality	equal
equall	equal
equally	equal
equalness	equal
equals	equal
equinoctial	equinocti
equinox	equinox
equipage	equipag

equity	equiti
equivocal	
equivoc	
equivocate	equivoc
equivocates	equivoc
equivocation	equivoc
equivocator	equivoc
er	er
erbear	erbear
erbearing	erbear
erbears	erbear
erbeat	erbeat
erblows	erblow
erboard	erboard
erborne	erborn
ercame	ercam
ercast	ercast
ercharg	ercharg
ercharged	ercharg
ercharging	ercharg
ercles	ercl
ercome	ercom
ercover	ercov
ercrows	ercrow
erdoing	erdo
ere	er
erebus	erebu
erect	erect
erected	erect
erecting	erect
erection	erect
erects	erect
erewhile	erewhil
erflourish	erflourish
erflow	erflow
erflowing	erflow
erflows	erflow
erfraught	erfraught
erga	erga
ergalled	ergal
erglanced	erglanc
ergo	ergo
ergone	ergon
ergrow	ergrow
ergrown	ergrown
ergrowth	ergrowth
erhang	erhang
erhanging	erhang

erhasty	erhasti
erhear	erhear
erheard	erheard
eringoes	eringo
erjoy	erjoi
erleap	erleap
erleaps	erleap
erleavens	erleaven
erlook	erlook
erlooking	erlook
ermaster	ermast
ermengare	ermengar
ermount	ermount
ern	ern
ernight	ernight
eros	ero
erpaid	erpaid
erparted	erpart
erpast	erpast
erpays	erpai
erpeer	erpeer
erperch	erperch
erpicturing	erpictur
erpingham	erpingham
erposting	erpost
erpow	erpow
erpress	erpress
erpressed	erpress
err	err
errand	errand
errands	errand
errant	errant
errate	errat
erraught	erraught
erreaches	erreach
erred	er
errest	errest
erring	er
erroneous	erron
error	error
errors	error
errs	err
errule	errul
errun	errun
erset	erset
ershade	ershad
ershades	ershad

ershine	ershin
ershot	
ershot	
ersized	ersiz
erskip	erskip
erslips	erslip
erspreads	erspread
erst	erst
erstare	erstar
erstep	erstep
erstunk	erstunk
ersway	erswai
ersways	erswai
erswell	erswel
erta	erta
ertake	ertak
erteemed	erteem
erthrow	erthrow
erthrown	erthrown
erthrows	erthrow
ertook	ertook
ertop	ertop
ertopping	ertop
ertrip	ertrip
erturn	erturn
erudition	erudit
eruption	erupt
eruptions	erupt
ervalues	ervalu
erwalk	erwalk
erwatch	erwatch
erween	erween
erweens	erween
erweigh	erweigh
erweighs	erweigh
erwhelm	erwhelm
erwhelmed	erwhelm
erworn	erworn
es	es
escalus	escalu
escap	escap
escape	escap
escaped	escap
escapes	escap
eschew	eschew
escoted	escot
esill	esil
especial	especi

especially	especi
esperance	esper
espials	espial
espied	espi
espies	espi
espous	espou
espouse	espous
espy	espi
esquire	esquir
esquires	esquir
essay	essai
essays	essai
essence	essenc
essential	essenti
essentially	essenti
esses	ess
essex	essex
est	est
establish	establish
established	establish
estate	estat
estates	estat
esteem	esteem
esteemed	esteem
esteemeth	esteemeth
esteeming	esteem
esteems	esteem
estimable	estim
estimate	estim
estimation	estim
estimations	estim
estime	estim
estranged	estrang
estridge	estridg
estridges	estridg
et	et
etc	etc
etceteras	etcetera
ete	et
eternal	etern
eternally	etern
eterne	etern
eternity	etern
eterniz	eterniz
etes	et
ethiop	ethiop
ethiope	ethiop
ethiopes	ethiop

ethiopian	ethiopian
etna	
etna	
eton	eton
etre	etr
eunuch	eunuch
eunuchs	eunuch
euphrates	euphrat
euphronius	euphroniu
euriphile	euriphil
europa	europa
europe	europ
ev	ev
evade	evad
evades	evad
evans	evan
evasion	evas
evasions	evas
eve	ev
even	even
evening	even
evenly	evenli
event	event
eventful	event
events	event
ever	ever
everlasting	everlast
everlastingly	everlastingly
evermore	evermor
every	everi
everyone	everyon
everything	everyth
everywhere	everywher
evidence	evid
evidences	
evid	
evident	evid
evil	evil
evilly	evilli
evils	evil
evitate	evit
ewe	ew
ewer	ewer
ewers	ewer
ewes	ew
exact	exact
exacted	exact
exactest	exactest

exacting	exact
exaction	exact
exactions	exact
exactly	exactli
exacts	exact
exalt	exalt
exalted	exalt
examin	examin
examination	examin
examinations	examin
examine	examin
examined	examin
examines	examin
exampl	exampl
example	exampl
exampled	exampl
examples	exampl
exasperate	exasper
exasperates	exasper
exceed	
exce	
exceeded	exceed
exceedeth	exceedeth
exceeding	exceed
exceedingly	exceedingli
exceeds	exce
excel	excel
excelled	excel
excellence	excel
excellencies	excel
excellency	excel
excellent	excel
excellently	excel
excelling	excel
excels	excel
except	except
excepted	except
excepting	except
exception	except
exceptions	except
exceptless	exceptless
excess	excess
excessive	excess
exchang	exchang
exchange	exchang
exchanged	exchang
exchequer	exchequ
exchequers	exchequ

excite	excit
excited	excit
excitements	excit
excites	
excit	
exclaim	exclaim
exclaims	exclaim
exclamation	exclam
exclamations	exclam
excludes	exclud
excommunicate	excommun
excommunication	excommun
excrement	excrement
excrements	excrement
excursion	excurs
excursions	excurs
excus	excus
excusable	excus
excuse	excus
excused	excus
excuses	excus
excusez	excusez
excusing	excus
execrable	execr
execrations	execr
execute	execut
executed	execut
executing	execut
execution	execut
executioner	execution
executioners	execution
executor	executor
executors	executor
exempt	exempt
exempted	exempt
exequies	
exequi	
exercise	exercis
exercises	exercis
exeter	exet
exeunt	exeunt
exhal	exhal
exhalation	exhal
exhalations	exhal
exhale	exhal
exhales	exhal
exhaust	exhaust
exhibit	exhibit

exhibitors	exhibit
exhibition	exhibit
exhort	exhort
exhortation	exhort
exigent	exig
exil	exil
exile	exil
exiled	exil
exion	exion
exist	exist
exists	exist
exit	exit
exits	exit
exorciser	exorcis
exorcisms	exorc
exorcist	exorcist
expect	expect
expectance	expect
expectancy	expect
expectation	expect
expectations	expect
expected	expect
expecters	expect
expecting	expect
expects	expect
expedience	expedi
expedient	expedi
expediently	expedi
expedition	expedit
expeditious	expediti
expel	expel
expell	expel
expelling	expel
expels	expel
expend	expend
expense	expens
expenses	expens
experienc	experienc
experience	experi
experiences	experi
experiment	experi
experimental	experiment
experiments	experi
expert	expert
expertness	expert
expiate	expiat
expiation	expiat
expir	expir

expiration	expir
expire	expir
expired	expir
expires	
expir	
expiring	expir
explication	explic
exploit	exploit
exploits	exploit
expos	expo
expose	expos
exposing	expos
exposition	exposit
expositor	expositor
expostulate	expostul
expostulation	expostul
exposture	expostur
exposure	exposur
expound	expound
expounded	expound
express	express
expressed	express
expresseth	expresseth
expressing	express
expressive	express
expressly	expressli
expressure	expressur
expuls	expul
expulsion	expuls
exquisite	exquisit
exsufflicate	exsuffl
extant	extant
extemporal	extempor
extemporally	extempor
extempore	
extempor	
extend	extend
extended	extend
extends	extend
extent	extent
extenuate	extenu
extenuated	extenu
extenuates	extenu
extenuation	extenu
exterior	exterior
exteriorly	exteriorli
exteriors	exterior
extermin	extermin

extern	extern
external	extern
extinct	extinct
extincted	extinct
extincture	extinctur
extinguish	extinguish
extirp	extirp
extirpate	extirp
extirped	extirp
extol	extol
extoll	extol
extolment	extol
exton	exton
extort	extort
extorted	extort
extortion	extort
extortions	extort
extra	extra
extract	
	extract
extracted	extract
extracting	extract
extraordinarily	extraordinarili
extraordinary	extraordinari
extraught	extraught
extravagancy	extravag
extravagant	extravag
extreme	extrem
extremely	extrem
extremes	extrem
extremest	extremest
extremities	extrem
extremity	extrem
exuent	exuent
exult	exult
exultation	exult
ey	ey
eyas	eya
eyases	eyas
eye	ey
eyeball	eyebal
eyeballs	eyebal
eyebrow	eyebrow
eyebrows	eyebrow
eyed	ei
eyeless	eyeless
eyelid	eyelid
eyelids	eyelid

eyes	ey
eyesight	eyesight
eyestrings	
eyestr	
eying	ei
eyne	eyn
eyrie	eyri
fa	fa
fabian	fabian
fable	fabl
fables	fabl
fabric	fabric
fabulous	fabul
fac	fac
face	face
faced	face
facere	facer
faces	face
faciant	faciant
facile	facil
facility	facil
facinerosus	facineri
facing	face
facit	facit
fact	fact
faction	faction
factionary	factionari
factions	faction
factious	factiou
factor	factor
factors	factor
faculties	faculti
faculty	faculti
fade	fade
faded	fade
fadeth	
fadeth	
fadge	fadg
fading	fade
fadings	fade
fadom	fadom
fadoms	fadom
fagot	fagot
fagots	fagot
fail	fail
failing	fail
fails	fail
fain	fain

faint	faint
fainted	faint
fainter	fainter
fainting	faint
faintly	faintli
faintness	faint
faints	faint
fair	fair
fairer	fairer
fairest	fairest
fairies	fairi
fairing	fair
fairings	fair
fairly	fairli
fairness	fair
fairs	fair
fairwell	fairwel
fairy	fairi
fais	fai
fait	fait
faites	
fait	
faith	faith
faithful	faith
faithfull	faithful
faithfully	faithfulli
faithless	faithless
faiths	faith
faitors	faitor
fal	fal
falchion	falchion
falcon	falcon
falconbridge	falconbridg
falconer	falcon
falconers	falcon
fall	fall
fallacy	fallaci
fallen	fallen
falleth	falleth
falliable	falliabl
fallible	fallibl
falling	fall
fallow	fallow
fallows	fallow
falls	fall
fally	falli
falorous	falor
false	fals

falsehood	falsehood
falsely	fals
falseness	fals
falseer	falseer
falsify	falsifi
falsing	fals
falstaff	falstaff
falstaffs	falstaff
falter	falter
fam	fam
fame	fame
famed	fame
familiar	familiar
familiarity	familiar
familiarly	familiarli
familiars	familiar
family	famili
famine	famin
famish	famish
famished	famish
famous	famou
famoused	famous
famously	famous
fan	fan
fanatical	fanat
fancies	fanci
fancy	fanci
fane	fane
fanes	fane
fang	fang
fangled	fangl
fangless	fangless
fangs	fang
fann	fann
fanning	fan
fans	fan
fantasied	
fantasi	
fantasies	fantasi
fantastic	fantast
fantastical	fantast
fantastically	fantast
fantasticoes	fantastico
fantasy	fantasi
fap	fap
far	far
farborough	farborough
farced	farc

fardel	fardel
fardels	fardel
fare	fare
fares	fare
farewell	farewel
farewells	farewel
fariner	farin
faring	fare
farm	farm
farmer	farmer
farmhouse	farmhous
farms	farm
farre	farr
farrow	farrow
farther	farther
farthest	farthest
farthing	farth
farthingale	farthingal
farthingales	farthingal
farthings	farth
fartuous	
fartuou	
fas	fa
fashion	fashion
fashionable	fashion
fashioning	fashion
fashions	fashion
fast	fast
fasted	fast
fasten	fasten
fastened	fasten
faster	faster
fastest	fastest
fasting	fast
fastly	fastli
fastolfe	fastolf
fasts	fast
fat	fat
fatal	fatal
fatally	fatal
fate	fate
fated	fate
fates	fate
father	father
fathered	father
fatherless	fatherless
fatherly	fatherli
fathers	father

fathom	fathom
fathomless	fathomless
fathoms	fathom
fatigate	fatig
fatness	fat
fats	
	fat
fatted	fat
fatter	fatter
fattest	fattest
fatting	fat
fatuus	fatuu
fauconbridge	fauconbridg
faulconbridge	faulconbridg
fault	fault
faultiness	faulti
faultless	faultless
faults	fault
faulty	faulti
fausse	fauss
fauste	faust
faustuses	faustus
faut	faut
favor	favor
favorable	favor
favorably	favor
favors	favor
favour	favour
favourable	favour
favoured	favour
favouredly	favouredli
favourer	favour
favourers	favour
favouring	favour
favourite	favourit
favourites	favourit
favours	favour
favout	
	favout
fawn	fawn
fawneth	fawneth
fawning	fawn
fawns	fawn
fay	fai
fe	fe
fealty	fealti
fear	fear
feared	fear

fearest	fearest
fearful	fear
fearfull	fearful
fearfully	fearfulli
fearfulness	fear
fearing	fear
fearless	fearless
fears	fear
feast	feast
feasted	feast
feasting	feast
feasts	feast
feat	feat
feated	feat
feater	feater
feather	feather
feathered	feather
feathers	feather
featly	featli
feats	feat
featur	featur
feature	featur
featured	
	featur
featureless	featureless
features	featur
february	februari
fecks	feck
fed	fed
fedary	fedari
federary	federari
fee	fee
feeble	feabl
feebled	feabl
febleness	feabl
feebly	feabli
feed	feed
feeder	feeder
feeders	feeder
feedeth	feedeth
feeding	feed
feeds	feed
feel	feel
feeler	feeler
feeling	feel
feelingly	feelingli
feels	feel

fees	fee
feet	feet
fehemently	fehement
feign	feign
feigned	feign
feigning	feign
feil	feil
feith	
	feith
felicitate	felicit
felicity	felic
fell	fell
fellest	fellest
fellies	felli
fellow	fellow
fellowly	fellowli
fellows	fellow
fellowship	fellowship
fellowships	fellowship
fells	fell
felon	felon
felonious	feloni
felony	feloni
felt	felt
female	femal
females	femal
feminine	feminin
fen	fen
fenc	fenc
fence	fenc
fencer	fencer
fencing	fenc
fends	fend
fennel	fennel
fenny	fenni
fens	fen
fenton	fenton
fer	fer
ferdinand	ferdinand
fere	fere
fernseed	fernse
ferrara	ferrara
ferrers	ferrer
ferret	ferret
ferry	ferri
ferryman	ferryman
fertile	fertil
fertility	fertil

fervency	fervenc
fervour	fervour
fery	feri
fest	fest
feste	fest
fester	fester
festinate	festin
festinately	festin
festival	festiv
festivals	festiv
fet	fet
fetch	fetch
fetches	fetch
fetching	fetch
fetlock	fetlock
fetlocks	fetlock
fett	fett
fetter	fetter
fettering	fetter
fetters	fetter
fettle	fettl
feu	feu
feud	feud
fever	
fever	
feverous	fever
fevers	fever
few	few
fewer	fewer
fewest	fewest
fewness	few
fickle	fickl
fickleness	fickl
fico	fico
fiction	fiction
fiddle	fiddl
fiddler	fiddler
fiddlestick	fiddlestick
fidele	fidel
fidelicet	fidelicet
fidelity	fidel
fidius	fidiu
fie	fie
field	field
fielded	field
fields	field
fiend	fiend
fiends	fiend

fierce	fierc
fiercely	fierc
fierceness	fierc
fiery	fieri
fife	fife
fifes	fife
fifteen	fifteen
fifteens	fifteen
fifteenth	
fifteenth	
fifth	fifth
fifty	fifti
fiftyfold	fiftyfold
fig	fig
fight	fight
fighter	fighter
fightest	fightest
fighteth	fighteth
fighting	fight
fighths	fight
figo	figo
figs	fig
figur	figur
figure	figur
figured	figur
figures	figur
figuring	figur
fike	fike
fil	fil
filberts	filbert
filch	filch
filches	filch
filching	filch
file	file
filed	file
files	file
filial	filial
filius	filiu
fill	fill
filled	fill
fillet	fillet
filling	
fill	
fillip	fillip
fills	fill
filly	filli
film	film
fil	fil

filth	filth
filths	filth
filthy	filthi
fin	fin
finally	final
finch	finch
find	find
finder	finder
findeth	findeth
finding	find
findings	find
finds	find
fine	fine
fineless	fineless
finely	fine
finem	finem
fineness	fine
finer	finer
fines	fine
finest	finest
fing	fing
finger	finger
fingering	finger
fingers	finger
fingre	fingr
fingres	fingr
finical	finic
finish	finish
finished	finish
finisher	finish
finless	finless
finn	finn
fins	fin
finsbury	finsburi
fir	fir
firago	firago
fire	fire
firebrand	firebrand
firebrands	firebrand
fired	fire
fires	fire
firework	firework
fireworks	firework
firing	fire
firk	firk
firm	firm
firmament	firmament
firmly	firmli

firmness	firm
first	first
firstlings	firstl
fish	fish
fisher	fisher
fishermen	fishermen
fishers	fisher
fishes	fish
fishified	fishifi
fishmonger	fishmong
fishpond	
	fishpond
fisnomy	fisnomi
fist	fist
fisting	fist
fists	fist
fistula	fistula
fit	fit
fitchew	fitchew
fitful	fit
fitly	fitli
fitment	fitment
fitness	fit
fits	fit
fitted	fit
fitter	fitter
fittest	fittest
fitteth	fitteth
fitting	fit
fitzwater	fitzwat
five	five
fivepence	fivep
fives	five
fix	fix
fixed	fix
fixes	fix
fixeth	fixeth
fixing	fix
fixture	fixtur
fl	fl
flag	flag
flagging	flag
flagon	flagon
flagons	flagon
flags	flag
flail	flail
flakes	flake
flaky	flaki

flam	flam
flame	flame
flamen	flamen
flamens	flamen
flames	flame
flaming	flame
flaminius	flaminiu
flanders	flander
flannel	flannel
flap	flap
flaring	flare
flash	flash
flashes	flash
flashing	flash
flask	flask
flat	flat
flatly	flatli
flatness	flat
flats	flat
flatt	flatt
flatter	flatter
flattered	flatter
flatterer	flatter
flatterers	flatter
flatterest	flatterest
flatteries	flatteri
flattering	flatter
flatters	
flatter	
flattery	flatteri
flaunts	flaunt
flavio	flavio
flavius	flaviu
flaw	flaw
flaws	flaw
flax	flax
flaxen	flaxen
flay	flai
flaying	flai
flea	flea
fleance	fleanc
fleas	flea
flecked	fleck
fled	fled
fledge	fledg
flee	flee
fleec	fleec
fleece	fleec

fleeces	fleec
fleer	fleer
fleering	fleer
fleers	fleer
fleet	fleet
fleeter	fleeter
fleeting	fleet
fleming	fleme
flemish	flemish
flesh	flesh
fleshes	flesh
fleshly	fleshli
fleshment	
fleshment	
fleshmonger	fleshmong
flew	flew
flexible	flexibl
flexure	flexur
flibbertigibbet	flibbertigibbet
flickering	flicker
flidge	flidg
fliers	flier
flies	fli
flieth	flieth
flight	flight
flights	flight
flighty	flighti
flinch	flinch
fling	fling
flint	flint
flints	flint
flinty	flinti
flirt	flirt
float	float
floated	float
floating	float
flock	flock
flocks	flock
flood	flood
floodgates	floodgat
floods	flood
floor	floor
flora	flora
florence	florenc
florentine	
florentin	
florentines	florentin
florentius	florentiu

florizel	florizel
flote	flote
floulish	floulish
flour	flour
flourish	flourish
flourishes	flourish
flourisheth	flourisheth
flourishing	flourish
flout	flout
flouted	flout
flouting	flout
flouts	flout
flow	flow
flowed	flow
flower	flower
flowerets	floweret
flowers	flower
flowing	flow
flown	flown
flows	flow
fluellen	fluellen
fluent	fluent
flung	flung
flush	flush
flushing	flush
fluster	fluster
flute	flute
flutes	flute
flutter	
flutter	
flux	flux
fluxive	fluxiv
fly	fly
flying	fly
fo	fo
foal	foal
foals	foal
foam	foam
foamed	foam
foaming	foam
foams	foam
foamy	foami
fob	fob
focative	foc
fodder	fodder
foe	foe
foeman	foeman
foemen	foemen

foes	foe
fog	fog
foggy	foggi
fogs	fog
foh	foh
foi	foi
foil	foil
foiled	foil
foils	foil
foin	foin
foining	foin
foins	foin
fois	foi
foison	foison
foisons	foison
foist	foist
foix	foix
fold	fold
folded	fold
folds	fold
folio	folio
folk	folk
folks	folk
follies	folli
follow	follow
followed	follow
follower	follow
followers	follow
followest	followest
following	follow
follows	follow
folly	folli
fond	fond
fonder	fonder
fondly	fondli
fondness	fond
font	font
fontibell	fontibel
food	food
fool	fool
fooleries	fooleri
foolery	fooleri
foolhardy	foolhardi
fooling	fool
foolish	foolish
foolishly	foolishli
foolishness	

foolish	
fools	fool
foot	foot
football	footbal
footboy	footboi
footboys	footboi
footed	foot
footfall	footfal
footing	foot
footman	footman
footmen	footmen
footpath	footpath
footsteps	footstep
footstool	footstool
fopp	fopp
fopped	fop
foppery	fopperi
foppish	foppish
fops	fop
for	for
forage	forag
foragers	forag
forbade	forbad
forbear	forbear
forbearance	forbear
forbears	forbear
forbid	forbid
forbidden	forbidden
forbiddenly	forbiddenli
forbids	forbid
forbod	forbod
forborne	
forborn	
forc	forc
force	forc
forced	forc
forceful	forc
forceless	forceless
forces	forc
forcible	forcibl
forcibly	forcibl
forcing	forc
ford	ford
fordid	fordid
fordo	fordo
fordoes	fordo
fordone	fordon
fore	fore

forecast	forecast
forefather	forefath
forefathers	forefath
forefinger	forefing
forego	forego
foregone	foregon
forehand	forehand
forehead	forehead
foreheads	forehead
forehorse	forehors
foreign	foreign
foreigner	foreign
foreigners	foreign
foreknowing	foreknow
foreknowledge	foreknowledg
foremost	
foremost	
forenamed	forenam
forenoon	forenoon
forerun	forerun
forerunner	forerunn
forerunning	forerun
foreruns	forerun
foresaid	foresaid
foresaw	foresaw
foresay	foresai
foresee	forese
foreseeing	forese
foresees	forese
foreshow	foreshow
foreskirt	foreskirt
forespent	foresp
forest	forest
forestall	forestal
forestalled	forestal
forester	forest
foresters	forest
forests	forest
foretell	foretel
foretelling	foretel
foretells	foretel
forethink	forethink
forethought	forethought
foretold	foretold
forever	forev
foreward	foreward
forewarn	

forewarn	
forewarned	forewarn
forewarning	forewarn
forfeit	forfeit
forfeited	forfeit
forfeiters	forfeit
forfeiting	forfeit
forfeits	forfeit
forfeiture	forfeitur
forfeitures	forfeitur
forfend	forfend
forfended	forfend
forg	forg
forgave	forgav
forge	forg
forged	forg
forgeries	forgeri
forgery	forgeri
forges	forg
forget	forget
forgetful	forget
forgetfulness	forget
forgetive	forget
forgets	forget
forgetting	forget
forgive	forgiv
forgiven	forgiven
forgiveness	forgiv
forgo	forgo
forgoing	forgo
forgone	forgon
forgot	
	forgot
forgotten	forgotten
fork	fork
forked	fork
forks	fork
forlorn	forlorn
form	form
formal	formal
formally	formal
formed	form
former	former
formerly	formerli
formless	formless
forms	form
fornication	fornic
fornications	fornic

fornicatress	fornicatress
forres	forr
forrest	forrest
forsake	forsak
forsaken	forsaken
forsaketh	forsaketh
forslow	forslow
forsook	forsook
forsooth	forsooth
forspent	forspent
forspoke	forspok
forswear	forswear
forswearing	forswear
forswore	forswor
forsworn	forsworn
fort	fort
forted	fort
forth	forth
forthcoming	forthcom
forthlight	forthlight
forthright	forthright
forthwith	forthwith
fortification	fortif
fortifications	fortif
fortified	fortifi
fortifies	fortifi
fortify	fortifi
fortinbras	fortinbra
fortitude	fortitud
fortnight	fortnight
fortress	fortress
fortresses	fortress
forts	fort
fortun	fortun
fortuna	fortuna
fortunate	fortun
fortunately	fortun
fortune	fortun
fortuned	fortun
fortunes	fortun
fortward	fortward
forty	forti
forum	forum
forward	forward
forwarding	forward
forwardness	
forward	
forwards	forward

forwearied	forweari
fosset	fosset
fost	fost
foster	foster
fostered	foster
fought	fought
foughten	foughten
foul	foul
fouler	fouler
foulest	foulest
fouly	foulli
foulness	foul
found	found
foundation	foundat
foundations	foundat
founded	found
founder	founder
fount	fount
fountain	fountain
fountains	fountain
founts	fount
four	four
fourscore	fourscor
fourteen	fourteen
fourth	fourth
foutra	foutra
fowl	fowl
fowler	fowler
fowling	fowl
fowls	
fowl	
fox	fox
foxes	fox
foxship	foxship
fracted	fract
fraction	fraction
fractions	fraction
fragile	fragil
fragment	fragment
fragments	fragment
fragrant	fragrant
frail	frail
frailer	frailer
frailties	frailti
frailty	frailti
fram	fram
frame	frame
framed	frame

frames	frame
frampold	frampold
fran	fran
francais	francai
france	franc
frances	franc
franchise	franchis
franchised	franchis
franchisement	franchis
franchises	franchis
franciae	francia
francis	franci
francisca	francisca
franciscan	
franciscan	
francisco	francisco
frank	frank
franker	franker
frankfort	frankfort
franklin	franklin
franklins	franklin
frankly	frankli
frankness	frank
frantic	frantic
franticly	franticli
frateretto	frateretto
fratrum	fratrum
fraud	fraud
fraudful	fraud
fraught	fraught
fraughtage	fraughtag
fraughting	fraught
fray	frai
frays	frai
freckl	freckl
freckled	freckl
freckles	freckl
frederick	frederick
free	free
freed	freed
freedom	freedom
freedoms	freedom
freehearted	freeheart
freelier	freelier
freely	freeli
freeman	freeman
freemen	freemen
freeness	freeness

freer	freer
frees	free
freestone	freeston
freetown	freetown
freeze	freez
freezes	freez
freezing	freez
freezings	freez
french	french
frenchman	frenchman
frenchmen	frenchmen
frenchwoman	frenchwoman
frenzy	frenzi
frequent	frequent
frequents	frequent
fresh	fresh
fresher	fresher
freshes	fresh
freshest	freshest
freshly	freshli
freshness	fresh
fret	fret
fretful	fret
frets	fret
fretted	fret
fretten	fretten
fretting	fret
friar	friar
friars	friar
friday	fridai
fridays	fridai
friend	friend
friended	friend
friending	friend
friendless	friendless
friendliness	friendli
friendly	friendli
friends	friend
friendship	friendship
friendships	friendship
frieze	friez
fright	fright
frighted	fright
frightened	frighten
frightful	fright
frighting	fright
frights	fright
fringe	fring

fringed	fring
frippery	fripper
frisk	frisk
fritters	fritter
frivolous	frivol
fro	fro
frock	frock
frog	frog
frognose	frognose
froissart	froissart
frolic	frolic
from	from
front	front
fronted	front
frontier	frontier
frontiers	frontier
fronting	front
frontlet	frontlet
fronts	front
frost	frost
frosts	frost
frosty	frost
froth	froth
froward	froward
frown	frown
frowning	frown
frowningly	frowningly
frowns	frown
froze	froze
frozen	frozen
fructify	fructify
frugal	frugal
fruit	fruit
fruiterer	fruiter
fruitful	fruit
fruitfully	fruitfully
fruitfulness	fruit
fruition	fruition
fruitless	fruitless
fruits	fruit
frush	frush
frustrate	frustrate
frutify	frutify
fry	fry
fubb	fubb
fuel	fuel
fugitive	fugitive
fulfil	fulfil

fulfill	fulfil
fulfilling	fulfil
fulfils	fulfil
full	full
fullam	fullam
fuller	fuller
fullers	fuller
fullest	fullest
fullness	full
fully	fulli
fulness	ful
fulsome	fulsom
fulvia	fulvia
fum	fum
fumble	fumbl
fumbles	fumbl
fumblest	fumblest
fumbling	fumbl
fume	fume
fumes	fume
fuming	fume
fumiter	fumit
fumitory	fumitori
fun	fun
function	function
functions	function
fundamental	fundament
funeral	funer
funerals	funer
fur	fur
furbish	furbish
furies	furi
furious	furiou
furlongs	furlong
furnace	furnac
furnaces	furnac
furnish	furnish
furnished	furnish
furnishings	furnish
furniture	furnitur
furnival	furniv
furor	furor
furr	furr
furrow	furrow
furrowed	furrow
furrows	furrow
furth	furth
further	further

furtherance	further
furtherer	further
furthermore	furthermor
furthest	furthest
fury	furi
furze	furz
furzes	furz
fust	fust
fustian	fustian
fustilarian	fustilarian
fusty	fusti
fut	fut
future	futur
futurity	futur
g	g
gabble	gabbl
gaberdine	gaberdin
gabriel	gabriel
gad	gad
gadding	gad
gads	gad
gadshill	gadshil
gag	gag
gage	gage
gaged	gage
gagg	gagg
gaging	gage
gagne	gagn
gain	gain
gained	gain
gainer	gainer
gaingiving	gaingiv
gains	gain
gainsaid	gainsaid
gainsay	gainsai
gainsaying	gainsai
gainsays	gainsai
gainst	gainst
gait	gait
gaited	gait
galathe	galath
gale	
	gale
galen	galen
gales	gale
gall	gall
gallant	gallant
gallantly	gallantli

gallantry	gallantri
gallants	gallant
galled	gall
gallery	galleri
galley	gallei
galleys	gallei
gallia	gallia
gallian	gallian
galliard	galliard
galliasses	galliass
gallimaufry	gallimaufri
galling	gall
gallons	gallon
gallop	gallop
galloping	gallop
gallops	gallop
gallow	gallow
galloway	gallowai
gallowglasses	gallowglass
gallows	gallow
gallowses	gallows
galls	gall
gallus	gallu
gam	gam
gambol	gambol
gambold	gambold
gambols	gambol
gamboys	gamboi
game	game
gamers	gamer
games	game
gamesome	gamesom
gamester	gamest
gaming	game
gammon	gammon
gamut	gamut
gan	gan
gangren	gangren
ganymede	ganymed
gaol	gaol
gaoler	gaoler
gaolers	gaoler
gaols	gaol
gap	gap
gape	gape
gapes	gape
gaping	gape

gar	gar
garb	garb
garbage	garbag
garboils	garboil
garcon	garcon
gard	gard
garde	gard
garden	garden
gardener	garden
gardeners	garden
gardens	
garden	
gardez	gardez
gardiner	gardin
gardon	gardon
gargantua	gargantua
gargrave	gargrav
garish	garish
garland	garland
garlands	garland
garlic	garlic
garment	garment
garments	garment
garmet	garmet
garner	garner
garners	garner
garnish	garnish
garnished	garnish
garret	garret
garrison	garrison
garrisons	garrison
gart	gart
garter	garter
garterd	garterd
gartering	garter
garters	garter
gascony	gasconi
gash	gash
gashes	gash
gaskins	gaskin
gasp	gasp
gaspig	gasp
gasted	
gast	
gastness	gast
gat	gat
gate	gate
gated	gate

gates	gate
gath	gath
gather	gather
gathered	gather
gathering	gather
gathers	gather
gatories	gatori
gatory	gatori
gaud	gaud
gaudeo	gaudeo
gaudy	gaudi
gauge	gaug
gaul	gaul
gaultree	gaultre
gaunt	gaunt
gauntlet	gauntlet
gauntlets	gauntlet
gav	gav
gave	gave
gavest	gavest
gawded	gawd
gawds	gawd
gawsey	gawsei
gay	gai
gayness	gay
gaz	gaz
gaze	gaze
gazed	
gaze	
gazer	gazer
gazers	gazer
gazes	gaze
gazeth	gazeth
gazing	gaze
gear	gear
geck	geck
geese	gees
geffrey	geffrei
geld	geld
gelded	geld
gelding	geld
gelida	gelida
gelidus	gelidu
gelt	gelt
gem	gem
geminy	gemini
gems	gem
gen	gen

gender	gender
genders	gender
general	gener
generally	gener
generals	gener
generation	gener
generations	gener
generative	gener
generosity	generos
generous	gener
genitive	genit
genitivo	genitivo
genius	geniu
gennets	gennet
genoa	genoa
genoux	genoux
gens	gen
gent	gent
gentilhomme	gentilhomm
gentility	gentil
gentle	gentl
gentlefolks	gentlefolk
gentleman	gentleman
gentlemanlike	gentlemanlik
gentlemen	gentlemen
gentleness	gentl
gentler	gentler
gentles	gentl
gentlest	gentlest
gentlewoman	gentlewoman
gentlewomen	gentlewomen
gently	gentli
gentry	gentri
george	georg
gerard	gerard
germaines	germain
germains	germain
german	german
germane	german
germans	german
germany	germani
gertrude	gertrud
gest	gest
gests	
gest	
gesture	gestur
gestures	gestur

get	get
getrude	getrud
gets	get
getter	getter
getting	get
ghastly	ghastli
ghost	ghost
ghosted	ghost
ghostly	ghostli
ghosts	ghost
gi	gi
giant	giant
giantess	giantess
giantlike	giantlik
giants	giant
gib	gib
gibber	gibber
gibbet	gibbet
gibbets	gibbet
gibe	gibe
giber	giber
gibes	gibe
gibing	gibe
gibingly	gibingli
giddily	giddili
giddiness	giddi
giddy	giddi
gift	gift
gifts	gift
gig	
gig	
giglets	giglet
giglot	giglot
gilbert	gilbert
gild	gild
gilded	gild
gilding	gild
gilliams	gilliam
gillian	gillian
gills	gill
gillyvors	gillyvor
gilt	gilt
gimmal	gimmal
gimmers	gimmer
gin	gin
ging	ging
ginger	ginger
gingerbread	gingerbread

gingerly	gingerli
ginn	ginn
gins	gin
gioucestershire	gioucestershir
gipes	gipe
gipsies	gipsi
gipsy	gipsi
gird	gird
girded	gird
girdle	girdl
girdled	girdl
girdles	girdl
girdling	girdl
girl	girl
girls	
girl	
girt	girt
girth	girth
gis	gi
giv	giv
give	give
given	given
giver	giver
givers	giver
gives	give
givest	givest
giveth	giveth
giving	give
givings	give
glad	glad
gladded	glad
gladding	glad
gladly	gladli
gladness	glad
glamis	glami
glanc	glanc
glance	glanc
glanced	glanc
glances	glanc
glancing	glanc
glanders	glander
glansdale	glansdal
glare	glare
glares	glare
glass	glass
glasses	glass
glassy	glassi
glaz	glaz

glazed	glaze
gleams	gleam
glean	glean
gleaned	glean
gleaning	glean
gleeful	gleeful
gleek	gleek
gleeking	gleek
gleeks	gleek
glend	glend
glendower	glendow
glib	glib
glide	glide
glided	glide
glides	glide
glideth	glideth
gliding	glide
glimmer	glimmer
glimmering	glimmer
glimmers	glimmer
glimpse	glimps
glimpsed	glimps
glist	glist
glistening	glisten
glisten	glisten
glistering	glisten
glisters	glisten
glitt	glitt
glittering	glitter
globe	globe
globes	globe
glooming	
gloom	
gloomy	gloomi
glories	glori
glorified	glorifi
glorify	glorifi
glorious	gloriou
gloriously	glorious
glory	glori
glose	glose
gloss	gloss
glosses	gloss
glou	glou
glouceste	gloucest
gloucester	gloucest
gloucestershire	gloucestershir
glove	glove

glover	glover
gloves	glove
glow	glow
glowed	glow
glowing	glow
glowworm	glowworm
gloz	gloz
gloze	gloze
glozes	gloze
glu	glu
glue	glue
glued	glu
glues	glue
glut	glut
glutt	glutt
glutted	glut
glutton	
	glutton
gluttoning	glutton
gluttony	gluttoni
gnarled	gnarl
gnarling	gnarl
gnat	gnat
gnats	gnat
gnaw	gnaw
gnawing	gnaw
gnawn	gnawn
gnaws	gnaw
go	go
goad	goad
goaded	goad
goads	goad
goal	goal
goat	goat
goatish	goatish
goats	goat
gobbets	gobbet
gobbo	gobbo
goblet	goblet
goblets	goblet
goblin	goblin
goblins	goblin
god	god
godded	god
godden	godden
goddess	goddess
goddesses	goddess
goddild	goddild

godfather	godfath
godfathers	
godfath	
godhead	godhead
godlike	godlik
godliness	godli
godly	godli
godmother	godmoth
gods	god
godson	godson
goer	goer
goers	goer
goes	goe
goest	goest
goeth	goeth
goffe	goff
gogs	gog
going	go
gold	gold
golden	golden
goldenly	goldenli
goldsmith	goldsmith
goldsmiths	goldsmith
golgotha	golgotha
goliases	goliias
goliath	goliath
gon	gon
gondola	gondola
gondolier	gondoli
gone	gone
goneril	goneril
gong	gong
gonzago	gonzago
gonzalo	gonzalo
good	good
goodfellow	goodfellow
goodlier	goodlier
goodliest	goodliest
goodly	goodli
goodman	goodman
goodness	good
goodnight	goodnight
goodrig	goodrig
goods	good
goodwife	goodwif
goodwill	goodwil
goodwin	goodwin
goodwins	goodwin

goodyear	goodyear
goodyears	goodyear
goose	goos
gooseberry	gooseberri
goosequills	goosequil
goot	goot
gor	gor
gorbellied	gorbelli
gorboduc	gorboduc
gordian	gordian
gore	gore
gored	gore
gorg	gorg
gorge	gorg
gorgeous	gorgeou
gorget	gorget
gorging	
gorg	
gorgon	gorgon
gormandize	gormand
gormandizing	gormand
gory	gori
gosling	gosl
gospel	gospel
gospels	gospel
goss	goss
gossamer	gossam
gossip	gossip
gossiping	gossip
gossiplate	gossiplate
gossips	gossip
got	got
goth	goth
goths	goth
gotten	gotten
gourd	gourd
gout	gout
gouts	gout
gouty	gouti
govern	govern
governance	govern
governed	govern
governess	gover
government	govern
governor	governor
governors	governor
governs	govern
gower	gower

gown	gown
gowns	
gown	
grac	grac
grace	grace
graced	grace
graceful	grace
gracefully	gracefulli
graceless	graceless
graces	grace
gracing	grace
gracious	graciou
graciously	gracious
gradation	gradat
graff	graff
graffing	graf
graft	graft
grafted	graft
grafters	grafter
grain	grain
grained	grain
grains	grain
gramercies	gramerci
gramercy	gramerci
grammar	grammar
grand	grand
grandam	grandam
grandame	grandam
grandchild	grandchild
grande	grand
grandeur	grandeur
grandfather	grandfath
grandjurors	grandjuror
grandmother	
grandmoth	
grandpre	grandpr
grandsir	grandsir
grandsire	grandsir
grandsires	grandsir
grange	grang
grant	grant
granted	grant
granting	grant
grants	grant
grape	grape
grapes	grape
grapple	grappl
grapples	grappl

grappling	grappl
grasp	grasp
grasped	grasp
grasps	grasp
grass	grass
grasshoppers	grasshopp
grassy	grassi
grate	grate
grated	grate
grateful	grate
grates	grate
gratiano	gratiano
gratify	gratifi
gratii	gratii
gratillity	gratil
grating	grate
gratis	grati
gratitude	
gratitud	
gratulate	gratul
grav	grav
grave	grave
gravediggers	gravedigg
gravel	gravel
graveless	graveless
gravell	gravel
gravely	grave
graven	graven
graveness	grave
graver	graver
graves	grave
gravest	gravest
gravestone	graveston
gravities	graviti
gravity	graviti
gravy	gravi
gray	grai
graymalkin	graymalkin
graz	graz
graze	graze
grazed	graze
grazing	graze
grease	greas
greases	greas
greasily	greasili
greasy	greasi
great	great
greater	greater

greatest	greatest
greatly	
greatli	
greatness	great
grecian	grecian
grecians	grecian
gree	gree
greece	greec
greed	greed
greedily	greedili
greediness	greedi
greedy	greedi
greeing	gree
greek	greek
greekish	greekish
greeks	greek
green	green
greener	greener
greenly	greenli
greens	green
greensleeves	greensleev
greenwich	greenwich
greenwood	greenwood
greet	greet
greeted	greet
greeting	greet
greetings	greet
greet	greet
greg	greg
gregory	gregori
gremio	gremio
grew	grew
grey	grei
greybeard	greybeard
greybeards	greybeard
greyhound	greyhound
greyhounds	greyhound
grief	grief
griefs	grief
griev	griev
grievance	grievanc
grievances	grievanc
grieve	griev
grieved	griev
grieves	griev
grievest	grievest
grieving	griev
grievingly	grievingli

grievous	grievou
grievously	grievous
griffin	griffin
griffith	griffith
grim	grim
grime	grime
grimly	grimli
grin	grin
grind	grind
grinding	grind
grindstone	grindston
grinning	grin
grip	grip
gripe	gripe
gripes	gripe
griping	gripe
grise	grise
grisly	grisli
grissel	grissel
grize	grize
grizzle	grizzl
grizzled	grizzl
groan	groan
groaning	groan
groans	groan
groat	groat
groats	groat
groin	groin
groom	groom
grooms	groom
grop	grop
groping	grope
gros	gro
gross	gross
grosser	grosser
grossly	grossli
grossness	gross
ground	ground
grounded	ground
groundlings	groundl
grounds	ground
grove	grove
grovel	grovel
grovelling	grovel
groves	grove
grow	grow
groweth	groweth
growing	grow

grown	grown
grows	grow
growth	growth
grub	grub
grubb	grubb
grubs	grub
grudge	grudg
grudged	grudg
grudges	grudg
grudging	grudg
gruel	gruel
grumble	grumbl
grumblest	grumblest
grumbling	grumbl
grumbings	grumbl
grumio	grumio
grund	grund
grunt	grunt
gualtier	gualtier
guard	guard
guardage	guardag
guardant	guardant
guarded	guard
guardian	guardian
guardians	guardian
guards	guard
guardsman	guardsman
gud	gud
gudgeon	gudgeon
guerdon	guerdon
guerra	guerra
guess	guess
guesses	
	guess
guessingly	guessingli
guest	guest
guests	guest
guiana	guiana
guichard	guichard
guide	guid
guided	guid
guider	guider
guiderius	guideriu
guides	guid
guiding	guid
guidon	guidon
guienne	guienn
guil	guil

guilderstern	guilderstern
guilders	guilder
guildford	guildford
guildhall	guildhal
guile	guil
guiled	guil
guileful	guil
guilfords	guilford
guilt	guilt
guiltian	guiltian
guiltier	guiltier
guiltily	guiltili
guiltiness	guilti
guiltless	guiltless
guilts	guilt
guilty	guilti
guinea	
guinea	
guinever	guinev
guise	guis
gul	gul
gules	gule
gulf	gulf
gulfs	gulf
gull	gull
gulls	gull
gum	gum
gumm	gumm
gums	gum
gun	gun
gunner	gunner
gunpowder	gunpowd
guns	gun
gurnet	gurnet
gurney	gurnei
gust	gust
gusts	gust
gusty	gusti
guts	gut
gutter	gutter
guy	gui
guynes	guyn
guysors	guysor
gypsy	gypsi
gyve	gyve
gyved	gyve
gyves	gyve
h	h

ha	ha
haberdasher	haberdash
habiliment	habili
habiliments	habili
habit	habit
habitation	habit
habited	habit
habits	habit
habitude	habitud
hack	hack
hacket	hacket
hackney	hacknei
hacks	hack
had	had
hadst	hadst
haec	haec
haeres	haer
hag	hag
hagar	hagar
haggard	haggard
haggards	haggard
haggish	haggish
haggled	haggl
hags	hag
hail	hail
hailed	hail
hailstone	hailston
hailstones	hailston
hair	hair
hairless	hairless
hairs	hair
hairy	hairi
hal	hal
halberd	halberd
halberds	halberd
halcyon	halcyon
hale	hale
haled	hale
hales	hale
half	half
halfcan	halfcan
halfpence	halfpenc
halfpenny	halfpenni
halfpennyworth	halfpennyworth
halfway	halfwai
halidom	halidom

hall	hall
halloa	halloa
halloing	hallo
hallond	hallond
halloo	halloo
halloing	halloo
hallow	hallow
hallowed	hallow
hallowmas	hallowma
hallown	hallown
hals	hal
halt	halt
halter	halter
halters	halter
halting	halt
halts	halt
halves	halv
ham	ham
hames	hame
hamlet	
hamlet	
hammer	hammer
hammered	hammer
hammering	hammer
hammers	hammer
hamper	hamper
hampton	hampton
hams	ham
hamstring	hamstr
hand	hand
handed	hand
handful	hand
handicraft	handicraft
handicraftsmen	handicraftsmen
handing	hand
handiwork	handiwork
handkercher	handkerch
handkerchers	handkerch
handkerchief	handkerchief
handle	handl
handled	handl
handles	handl
handless	handless
handlest	handlest
handling	handl
handmaid	handmaid
handmaids	handmaid
hands	hand

handsaw	handsaw
handsome	handsom
handsomely	handsom
handsomeness	handsom
handwriting	handwrit
handy	handi
hang	hang
hanged	hang
hangers	hanger
hangeth	hangeth
hanging	hang
hangings	hang
hangman	hangman
hangmen	hangmen
hangs	hang
hannibal	hannib
hap	hap
hapless	hapless
haply	hapli
happ	happ
happen	happen
happened	happen
happier	happier
happies	happi
happiest	happiest
happily	happili
happiness	happi
happy	happi
haps	hap
harbinger	harbing
harbingers	harbing
harbor	harbor
harbour	harbour
harbourage	harbourag
harbouring	
harbour	
harbours	harbour
harcourt	harcourt
hard	hard
harder	harder
hardest	hardest
hardiest	hardiest
hardiment	hardiment
hardiness	hardi
hardly	hardli
hardness	hard
hardocks	hardock

hardy	hardi
hare	hare
harelip	harelip
hares	hare
harfleur	harfleur
hark	hark
harlot	harlot
harlotry	harlotri
harlots	harlot
harm	harm
harmed	harm
harmful	harm
harming	harm
harmless	harmless
harmonious	harmoni
harmony	harmoni
harms	harm
harness	har
harp	harp
harper	harper
harpier	harpier
harping	harp
harpy	harpi
harried	harri
harrow	harrow
harrows	harrow
harry	harri
harsh	harsh
harshly	harshli
harshness	harsh
hart	hart
harts	hart
harum	harum
harvest	harvest
has	ha
hast	hast
haste	hast
hasted	hast
hasten	hasten
hastes	hast
hastily	hastili
hasting	hast
hastings	hast
hasty	hasti
hat	hat
hatch	hatch
hatches	hatch
hatchet	hatchet

hatching	hatch
hatchment	hatchment
hate	hate
hated	hate
hateful	
hate	
hater	hater
haters	hater
hates	hate
hateth	hateth
hatfield	hatfield
hath	hath
hating	hate
hatred	hatr
hats	hat
haud	haud
hauf	hauf
haught	haught
haughtiness	haughti
haughty	haughti
haunch	haunch
haunches	haunch
haunt	haunt
haunted	haunt
haunting	haunt
haunts	haunt
hautboy	hautboi
hautboys	hautboi
have	have
haven	haven
havens	haven
haver	haver
having	have
havings	have
havior	havior
haviour	haviour
havoc	havoc
hawk	
hawk	
hawking	hawk
hawks	hawk
hawthorn	hawthorn
hawthorns	hawthorn
hay	hai
hazard	hazard
hazarded	hazard
hazards	hazard
hazel	hazel

hazelnut	hazelnut
he	he
head	head
headborough	headborough
headed	head
headier	headier
heading	head
headland	headland
headless	headless
headlong	headlong
heads	head
headsman	headsman
headstrong	headstrong
heady	headi
heal	heal
healed	heal
healing	heal
heals	heal
health	health
healthful	health
healths	health
healthsome	
healthsom	
healthy	healthi
heap	heap
heaping	heap
heaps	heap
hear	hear
heard	heard
hearer	hearer
hearers	hearer
hearest	hearest
heareth	heareth
hearing	hear
hearings	hear
heark	heark
hearken	hearken
hearkens	hearken
hears	hear
hearsay	hearsai
hearse	hears
hearsed	hears
hearst	hearst
heart	heart
heartache	heartach
heartbreak	heartbreak
heartbreaking	heartbreak
hearted	heart

hearten	hearten
hearth	hearth
hearths	hearth
heartily	heartili
heartiness	hearti
heartless	heartless
heartlings	heartl
heartly	heartli
hearts	heart
heartsick	heartsick
heartstrings	heartstr
heartly	hearti
heat	heat
heated	heat
heath	heath
heathen	heathen
heathenish	heathenish
heating	heat
heats	heat
heauties	heauti
heav	heav
heave	heav
heaved	heav
heaven	heaven
heavenly	heavenli
heavens	heaven
heaves	heav
heavier	heavier
heaviest	heaviest
heavily	heavili
heaviness	heavi
heaving	heav
hevings	heav
heavy	heavi
hebona	hebona
hebrew	hebrew
hecate	hecat
hectic	
	hectic
hector	hector
hectors	hector
hecuba	hecuba
hedg	hedg
hedge	hedg
hedghehog	hedghehog
hedghehogs	hedghehog
hedges	hedg
heed	heed

heeded	heed
heedful	heed
heedfull	heedful
heedfully	heedfulli
heedless	heedless
heel	heel
heels	heel
hefted	heft
hefts	heft
heifer	heifer
heifers	heifer
heigh	heigh
height	height
heighten	heighten
heinous	heinou
heinously	heinous
heir	heir
heiress	heiress
heirless	heirless
heirs	heir
held	held
helen	helen
helena	helena
helenus	helenu
heliac	helia
helicons	helicon
hell	hell
hellespont	hellespont
hellfire	hellfir
hellish	hellish
helm	helm
helmed	helm
helmet	helmet
helmets	helmet
helms	helm
help	help
helper	helper
helpers	helper
helpful	help
helping	help
helpless	helpless
helps	help
helter	helter
hem	hem
heme	heme
hemlock	hemlock
hemm	hemm
hemp	hemp

hempen	hempen
hems	hem
hen	hen
hence	henc
henceforth	henceforth
henceforward	henceforward
henchman	henchman
henri	henri
henricus	henricu
henry	henri
hens	hen
hent	hent
henton	henton
her	her
herald	herald
heraldry	heraldri
heralds	herald
herb	herb
herbert	herbert
herblets	herblet
herbs	herb
herculean	herculean
hercules	hercul
herd	herd
herds	herd
herdsman	herdsman
herdsmen	herdsmen
here	here
hereabout	hereabout
hereabouts	hereabout
hereafter	hereaft
hereby	herebi
hereditary	hereditari
hereford	hereford
herefordshire	herefordshir
herein	herein
hereof	
hereof	
heresies	heresi
heresy	heresi
heretic	heret
heretics	heret
hereto	hereto
hereupon	hereupon
heritage	heritag
heritier	heriti
hermes	herm
hermia	hermia

hermione	hermion
hermit	hermit
hermitage	hermitag
hermits	hermit
herne	hern
hero	hero
herod	herod
herods	herod
heroes	hero
heroic	heroic
heroical	heroic
herring	her
herrings	her
hers	her
herself	herself
hesperides	hesperid
hesperus	hesperu
hest	hest
hests	hest
heure	heur
heureux	heureux
hew	
	hew
hewgh	hewgh
hewing	hew
hewn	hewn
hews	hew
hey	hei
heyday	heydai
hibocrates	hibocr
hic	hic
hiccups	hiccup
hick	hick
hid	hid
hidden	hidden
hide	hide
hideous	hideou
hideously	hideous
hideousness	hideous
hides	hide
hidest	hidest
hiding	hide
hie	hie
hied	hi
hiems	hiem
hies	hi
hig	hig
high	high

higher	higher
highest	highest
highly	highli
highmost	highmost
highness	high
hight	hight
highway	highwai
highways	highwai
hilding	hild
hildings	hild
hill	hill
hillo	hillo
hilloa	hilloa
hills	hill
hilt	hilt
hilts	hilt
hily	hili
him	him
himself	himself
hinc	hinc
hinckley	hincklei
hind	hind
hinder	hinder
hindered	hinder
hinders	hinder
hindmost	hindmost
hinds	hind
hing	hing
hinge	hing
hinges	hing
hint	hint
hip	hip
hipp	hipp
hipparchus	hipparchu
hippolyta	hippolyta
hips	hip
hir	hir
hire	hire
hired	hire
hiren	
	hiren
hirtius	hirtiu
his	hi
hisperia	hisperia
hiss	hiss
hisses	hiss
hissing	hiss
hist	hist

historical	histor
history	histori
hit	hit
hither	hither
hitherto	hitherto
hitherward	hitherward
hitherwards	hitherward
hits	hit
hitting	hit
hive	hive
hives	hive
hizzing	hizz
ho	ho
hoa	hoa
hoar	hoar
hoard	hoard
hoarded	hoard
hoarding	hoard
hoars	hoar
hoarse	hoars
hoary	hoari
hob	hob
hobbididence	hobbidid
hobby	hobbi
hobbyhorse	
hobbyhors	
hobgoblin	hobgoblin
hobnails	hobnail
hoc	hoc
hod	hod
hodge	hodg
hog	hog
hogs	hog
hogshead	hogshead
hogsheads	hogshead
hois	hoi
hoise	hois
hoist	hoist
hoisted	hoist
hoists	hoist
holborn	holborn
hold	hold
holden	holden
holder	holder
holdeth	holdeth
holdfast	holdfast
holding	hold
holds	hold

hole	hole
holes	hole
holidam	holidam
holidame	holidam
holiday	holidai
holidays	holidai
holier	holier
holiest	holiest
holily	holili
holiness	holi
holla	holla
holland	holland
hollander	holland
hollanders	holland
holloa	holloa
holloaing	holloa
hollow	hollow
hollowly	hollowli
hollowness	hollow
holly	holli
holmedon	holmedon
holofernes	holofern
holp	holp
holy	holi
homage	homag
homager	homag
home	home
homely	home
homes	home
homespuns	homespun
homeward	homeward
homewards	homeward
homicide	homicid
homicides	homicid
homily	homili
hominem	hominem
hommes	homm
homo	homo
honest	honest
honester	honest
honestest	
honestest	
honestly	honestli
honesty	honesti
honey	honei
honeycomb	honeycomb
honeying	honei

honeyless	honeyless
honeysuckle	honeysuckl
honeysuckles	honeysuckl
honi	honi
honneur	honneur
honor	honor
honorable	honor
honorably	honor
honorato	honorato
honors	honor
honour	honour
honourable	honour
honourably	honour
honoured	honour
honourest	honourest
honourible	honour
honouring	honour
honours	honour
hoo	hoo
hood	hood
hooded	hood
hoodman	hoodman
hoods	hood
hoodwink	hoodwink
hoof	hoof
hoofs	
hoof	
hook	hook
hooking	hook
hooks	hook
hoop	hoop
hoops	hoop
hoot	hoot
hooted	hoot
hooting	hoot
hoots	hoot
hop	hop
hope	hope
hopeful	hope
hopeless	hopeless
hopes	hope
hopes	hopes
hoping	hope
hopkins	hopkin
hoppedance	hopped
hor	hor
horace	horac
horatio	horatio

horizon	horizon
horn	horn
hornbook	hornbook
horned	horn
horner	horner
horning	horn
hornpipes	hornpip
horns	horn
horologe	horolog
horrible	horribl
horribly	
horribl	
horrid	horrid
horrider	horrid
horridly	horridli
horror	horror
horrors	horror
hors	hor
horse	hors
horseback	horseback
horsed	hors
horsehairs	horsehair
horseman	horseman
horsemanship	horsemanship
horsemen	horsemen
horses	hors
horseway	horsewai
horsing	hors
hortensio	hortensio
hortensius	hortensiu
horum	horum
hose	hose
hospitable	hospit
hospital	hospit
hospitality	hospit
host	host
hostage	hostag
hostages	hostag
hostess	hostess
hostile	hostil
hostility	hostil
hostilius	hostiliu
hosts	
host	
hot	hot
hotly	hotli
hotspur	hotspur
hotter	hotter

hottest	hottest
hound	hound
hounds	hound
hour	hour
hourly	hourli
hours	hour
hous	hou
house	hous
household	household
householder	household
householders	household
households	household
housekeeper	housekeep
housekeepers	housekeep
housekeeping	housekeep
houseless	houseless
houses	hous
housewife	housewif
housewifery	housewiferi
housewives	housew
hovel	hovel
hover	hover
hovered	hover
hovering	hover
hovers	hover
how	how
howbeit	
howbeit	
howe	how
howeer	howeer
however	howev
howl	howl
howled	howl
howlet	howlet
howling	howl
howls	howl
howsoe	howso
howsoever	howsoev
howsome	howsom
hoxes	hox
hoy	hoi
hoyday	hoydai
hubert	hubert
huddled	huddl
huddling	huddl
hue	hue
hued	hu
hues	hue

hug	hug
huge	huge
hugely	huge
hugeness	huge
hugg	hugg
hugger	hugger
hugh	hugh
hugs	hug
hujus	huju
hulk	hulk
hulks	hulk
hull	hull
hulling	
hull	
hullo	hullo
hum	hum
human	human
humane	human
humanely	human
humanity	human
humble	humbl
humbled	humbl
humbleness	humbl
humbler	humbler
humbles	humbl
humblest	humblest
humbling	humbl
humbly	humbl
hume	hume
humh	humh
humidity	humid
humility	humil
humming	hum
humor	humor
humorous	humor
humors	humor
humour	humour
humourists	humourist
humours	humour
humphrey	humphrei
humphry	humphri
hums	hum
hundred	hundr
hundreds	hundr
hundredth	hundredth
hung	
hung	
hungarian	hungarian

hungary	hungari
hunger	hunger
hungerford	hungerford
hungerly	hungerli
hungry	hungri
hunt	hunt
hunted	hunt
hunter	hunter
hunters	hunter
hunteth	hunteth
hunting	hunt
huntington	huntington
huntress	huntress
hunts	hunt
huntsman	huntsman
huntsmen	huntsmen
hurdle	hurdl
hurl	hurl
hurling	hurl
hurls	hurl
hurly	hurli
hurlyburly	hurlyburli
hurricane	hurricane
hurricanes	hurricane
hurried	hurri
hurries	hurri
hurry	hurri
hurt	hurt
hurting	hurt
hurtled	
hurtl	
hurtless	hurtless
hurtling	hurtl
hurts	hurt
husband	husband
husbanded	husband
husbandless	husbandless
husbandry	husbandri
husbands	husband
hush	hush
hushes	hush
husht	husht
husks	husk
huswife	huswif
huswives	huswif
hutch	hutch
hybla	hybla
hydra	hydra

hyen	hyen
hymen	hymen
hymenaeus	hymenaeu
hymn	hymn
hymns	hymn
hyperboles	hyperbol
hyperbolical	hyperbol
hyperion	hyperion
hypocrisy	hypocrisi
hypocrite	hypocrit
hypocrites	hypocrit
hyrcan	hyrcan
hyrcania	hyrcania
hyrcanian	
hyrcanian	
hyssop	hyssop
hysterica	hysterica
i	i
iachimo	iachimo
iaculis	iaculi
iago	iago
iament	iament
ibat	ibat
icarus	icaru
ice	ic
iceland	iceland
ici	ici
icicle	icicl
icicles	icicl
icy	ici
idea	idea
ideas	idea
idem	idem
iden	iden
ides	id
idiot	idiot
idiots	idiot
idle	idl
idleness	idl
idles	idl
idly	idli
idol	idol
idolatrous	idolatr
idolatry	idolatri
ield	ield
if	if
ifs	if
ignis	

	igni	
ignoble		ignobl
ignobly		ignobl
ignominious		ignomini
ignominy		ignomini
ignomy		ignomi
ignorance		ignor
ignorant		ignor
ii		ii
iii		iii
iiii		iiii
il		il
ilbow		ilbow
ild		ild
ilion		ilion
ilium		ilium
ill		ill
illegitimate		illegitim
illiterate		illiter
illness		ill
illo		illo
ills		ill
illum		illum
illuminate		illuminate
illuminate		illuminate
illuminate		illuminate
illusion		illus
illusions		illus
illustrate		illustr
illustrated		illustr
illustrious		illustri
illyria		illyria
illyrian		illyrian
ils		il
im		im
image		imag
imagery		imageri
images		imag
imagin		imagin
imaginary		imaginari
imagination		imagin
imaginings		imagin
imagine		imagin
imagining		imagin
imaginings		imagin
imbar		imbar
imbecility		imbecil
imbrue		imbru

imitari	imitari
imitate	imit
imitated	imit
imitation	imit
imitations	imit
immaculate	immacul
immanity	imman
immask	immask
immaterial	immateri
immediacy	immediaci
immediate	immedi
immediately	immedi
imminence	immin
imminent	immin
immoderate	immoder
immoderately	
immoder	
immodest	immodest
immoment	immoment
immortal	immort
immortaliz	immortaliz
immortally	immort
immur	immur
immured	immur
immures	immur
imogen	imogen
imp	imp
impaint	impaint
impair	impair
impairing	impair
impale	impal
impaled	impal
impanelled	impanel
impart	impart
imparted	impart
impartial	imparti
impartment	impart
imparts	impart
impasted	impast
impatience	impati
impatient	impati
impatiently	impati
impawn	impawn
impeach	impeach
impeached	impeach
impeachment	impeach
impeachments	impeach
impedes	

imped	
impediment	impedi
impediments	impedi
impenetrable	impenetr
imperator	imper
imperceiverant	imperceiver
imperfect	imperfect
imperfection	imperfect
imperfections	imperfect
imperfectly	imperfectli
imperial	imperi
imperious	imperi
imperiously	imperi
impertinency	impertin
impertinent	impertin
impeticos	impetico
impetuosity	impetuos
impetuous	impetu
impieties	impieti
impiety	impieti
impious	impiou
implacable	implac
implements	implement
implies	impli
implor	implor
implorators	implor
implore	implor
implored	implor
imploring	implor
impon	impon
import	import
importance	import
importancy	import
important	import
importantly	importantli
imported	import
importeth	importeth
importing	import
importless	importless
imports	import
importun	importun
importunacy	importunaci
importunate	importun
importune	importun
importunes	importun
importunity	importun
impos	impo
impose	impos

imposed	impos
imposition	imposit
impositions	imposit
impossibilities	imposs
impossibility	imposs
impossible	imposs
imposthume	imposthum
impostor	impostor
impostors	impostor
impotence	impot
impotent	impot
impounded	impound
impregnable	impregn

imprese	impres
impress	impress
impressed	impress
impreseat	impreseat
impression	impress
impressure	impressur
imprimendum	imprimendum
imprimis	imprimi
imprint	imprint
imprinted	imprint
imprison	imprison
imprisoned	imprison
imprisoning	imprison
imprisonment	imprison
improbable	improb
improper	improp
improve	improv
improvident	improvid
impudence	impud
impudency	impud
impudent	impud
impudently	impud
impudique	impudiqu
impugn	impugn
impugns	impugn
impure	impur
imputation	imput
impute	imput
in	in
inaccessible	inaccess
inaidable	
inaid	
inaudible	inaud
inauspicious	inauspici

incaged	incag
incantations	incant
incapable	incap
incardinate	incardin
incarnadine	incarnadin
incarnate	incarn
incarnation	incarn
incens	incen
incense	incens
incensed	incens
incensement	incens
incenses	incens
incensing	incens
incertain	incertain
incertainties	incertainti
incertainty	incertainti
incessant	incess
incessantly	incessantli
incest	incest
incestuous	incestu
inch	inch
incharitable	incharit
inches	inch
incidency	incid
incident	incid
incision	incis
incite	incit
incites	incit
incivil	
incivil	
incivility	incivil
inclin	inclin
inclinable	inclin
inclination	inclin
incline	inclin
inclined	inclin
inclines	inclin
inclining	inclin
inclips	inclip
include	includ
included	includ
includes	includ
inclusive	inclus
incomparable	incompar
incomprehensible	incomprehens
inconsiderate	inconsider
inconstancy	inconst
inconstant	inconst

incontinency	incontin
incontinent	incontin
incontinently	incontin
inconvenience	inconveni
inconveniences	inconveni
inconvenient	inconveni
incony	inconi
incorporate	incorpor
incorps	incorp
incorrect	incorrect
increas	increa
increase	
increas	
increases	increas
increaseth	increaseth
increasing	increas
incredible	incred
incredulous	incredul
incur	incur
incurable	incur
incurr	incurr
incurred	incur
incursions	incurs
ind	ind
inde	ind
indebted	indebt
indeed	inde
indent	indent
indented	indent
indenture	indentur
indentures	indentur
index	index
indexes	index
india	india
indian	indian
indict	indict
indicted	indict
indictment	indict
indies	indi
indifferency	indiffer
indifferent	indiffer
indifferently	indiffer
indigent	indig
indigest	
indigest	
indigested	indigest
indign	indign
indignation	indign

indignations	indign
indigne	indign
indignities	indign
indignity	indign
indirect	indirect
indirection	indirect
indirections	indirect
indirectly	indirectli
indiscreet	indiscreet
indiscretion	indiscret
indispos	indispo
indisposition	indisposit
indissoluble	indissolubl
indistinct	indistinct
indistinguish	indistinguish
indistinguishable	indistinguish
indited	indit
individable	individ
indrench	indrench
indu	indu
indubitate	indubit
induc	induc
induce	induc
induced	induc
inducement	induc
induction	induct
inductions	
induct	
indue	indu
indued	indu
indues	indu
indulgence	indulg
indulgences	indulg
indulgent	indulg
indurance	indur
industrious	industri
industriously	industri
industry	industri
inequality	inequ
inestimable	inestim
inevitable	inevit
inexecrable	inexecr
inexorable	inexor
inexplicable	inexplic
infallible	infal
infallibly	infal
infamonize	infamon
infamous	infam

infamy	infami
infancy	infanc
infant	infant
infants	infant
infect	infect
infected	infect
infecting	infect
infection	infect
infections	infect
infectious	infecti
infectiously	
infecti	
infects	infect
infer	infer
inference	infer
inferior	inferior
inferiors	inferior
infernal	infern
inferr	inferr
inferreth	inferreth
inferring	infer
infest	infest
infidel	infidel
infidels	infidel
infinite	infini
infinitely	infini
infinitive	infini
infirm	infirm
infirmities	infirm
infirmity	infirm
infix	infix
infixing	infix
inflan	inflan
inflamm	inflan
inflaming	inflan
inflammation	inflamm
inflict	inflict
infliction	inflict
influence	influen
influences	influen
infol	infol
inform	inform
informal	
inform	
information	inform
informations	inform
informed	inform
informer	inform

informs	inform
infortunate	infortun
infring	infr
infringe	infring
infringed	infring
infus	infu
infuse	infus
infused	infus
infusing	infus
infusion	infus
ingener	ingen
ingenious	ingeni
ingeniously	ingeni
inglorious	inglori
ingots	ingot
ingrafted	ingraf
ingraft	ingraft
ingrate	ingrat
ingrated	ingrat
ingrateful	ingrat
ingratitude	ingritud
ingritudes	ingritud
ingredient	ingredi
ingredients	ingredi
ingross	ingross
inhabit	inhabit
inhabitable	
inhabit	
inhabitants	inhabit
inhabited	inhabit
inhabits	inhabit
inhearse	inhears
inhearsed	inhears
inherent	inher
inherit	inherit
inheritance	inherit
inherited	inherit
inheriting	inherit
inheritor	inheritor
inheritors	inheritor
inheritrix	inheritrix
inherits	inherit
inhibited	inhibit
inhibition	inhibit
inloop	inloop
inhuman	inhuman
iniquities	iniqu
iniquity	iniqu

initiate	initi
injointed	injoint
injunction	injunct
injunctions	injunct
injur	injur
injure	injur
injurer	injur
injuries	injuri
injurious	injuri
injury	injuri
injustice	
injustic	
ink	ink
inkhorn	inkhorn
inkle	inkl
inkles	inkl
inkling	inkl
inky	inki
inlaid	inlaid
inland	inland
inlay	inlai
inly	inli
inmost	inmost
inn	inn
inner	inner
innkeeper	innkeep
innocence	innoc
innocency	innoc
innocent	innoc
innocents	innoc
innovation	innov
innovator	innov
inns	inn
innumerable	innumer
inoculate	inocul
inordinate	inordin
inprimis	inprimi
inquir	inquir
inquire	inquir
inquiry	inquiri
inquisition	inquisit
inquisitive	inquisit
inroads	inroad
insane	insan
insanie	insani
insatiate	insati
insconce	insconc
inscrib	inscrib

inscription	inscript
inscriptions	inscript
inscroll	inscrol
inscrutable	inscrut
insculp	insculp
insculpture	insculptur
insensible	insens
inseparable	insepar
inseparate	insepar
insert	insert
inserted	insert
inset	inset
inshell	inshel
inshipp	inshipp
inside	insid
insinewed	insinew
insinuate	insinu
insinuateth	insinuateth
insinuating	insinu
insinuation	insinu
insisted	insist
insisting	insist
insisture	insistur
insociable	insoci
insolence	insol
insolent	
insol	
insomuch	insomuch
inspir	inspir
inspiration	inspir
inspirations	inspir
inspire	inspir
inspired	inspir
install	instal
installed	instal
instalment	instal
instance	instanc
instances	instanc
instant	instant
instantly	instantli
instate	instat
instead	instead
insteepled	insteepl
instigate	instig
instigated	instig
instigation	instig
instigations	instig
instigator	instig

instinct	instinct
instinctively	instinct
institute	institut
institutions	institut
instruct	instruct
instructed	instruct
instruction	instruct
instructions	instruct
instructs	instruct
instrument	instrument
instrumental	instrument
instruments	instrument
insubstantial	insubstanti
insufficiency	insuffici
insufficiency	insuffici
insult	insult
insulted	insult
insulting	insult
insultment	insult
insults	insult
insupportable	insupport
insuppressive	insuppress
insurrection	insurrect
insurrections	insurrect
int	int
integer	integ
integritas	integrita
integrity	integr
intellect	intellect
intellects	intellect
intellectual	intellectu
intelligence	intellig
intelligencer	intelligenc
intelligencing	intelligenc
intelligent	intellig
intelligis	intelligi
intelligo	intelligo
intemperance	intemper
intemperate	intemper
intend	intend
intended	intend
intendeth	intendeth
intending	intend
intendment	intend
intends	intend
intenable	inten
intent	intent

intention	intent
intently	intent
intents	intent
inter	inter
intercept	intercept
intercepted	intercept
interceptor	intercept
interception	intercept
intercepts	intercept
intercession	intercess
intercessors	intercessor
interchained	interchain
interchang	interchang
interchange	interchang
interchangeably	interchang
interchangement	interchang
interchanging	interchang
interdiction	interdict
interest	interest
interim	interim
interims	
interim	
interior	interior
interjections	interject
interjoin	interjoin
interlude	interlud
intermingle	intermingl
intermission	intermiss
intermissive	intermiss
intermit	intermit
intermix	intermix
intermixed	intermix
interpose	interpos
interposer	interpos
interposes	interpos
interpret	interpret
interpretation	interpret
interpreted	interpret
interpreter	interpret
interpreters	interpret
interprets	interpret
interr	interr
interred	inter
interrogatories	interrogatori
interrupt	interrupt
interrupted	interrupt
interrupter	interrupt
interruptest	interruptest

interruption	interrupt
interrupts	interrupt
intertissued	
intertissu	
intervallums	intervallum
interview	interview
intestate	intest
intestine	intestin
intil	intil
intimate	intim
intimation	intim
intituled	intitl
intituled	intitul
into	into
intolerable	intoler
intoxicates	intox
intreasured	intreasur
intreat	intreat
intrench	intrench
intrenchant	intrench
intricate	intric
inrinse	intrins
intrinsicate	intrins
intrude	intrud
intruder	intrud
intruding	intrud
intrusion	intrus
inundation	inund
inure	inur
inurn	inurn
invade	invad
invades	invad
invasion	invas
invasive	invas
invectively	
invect	
invectives	invect
inveigled	inveigl
invent	invent
invented	invent
invention	invent
inventions	invent
inventor	inventor
inventorially	inventori
inventoried	inventori
inventors	inventor
inventory	inventori
inverness	inver

invert	invert
invest	invest
invested	invest
investing	invest
investments	invest
inveterate	inveter
invincible	invinc
inviolable	inviol
invised	invis
invisible	invis
invitation	invit
invite	invit
invited	invit
invites	invit
inviting	invit
invitis	inviti
invocate	invoc
invocation	invoc
invoke	
invok	
invoked	invok
invulnerable	invulner
inward	inward
inwardly	inwardli
inwardness	inward
inwards	inward
ionia	ionia
ionian	ionian
ipse	ips
ipswich	ipswich
ira	ira
irae	ira
iras	ira
ire	ir
ireful	ir
ireland	ireland
iris	iri
irish	irish
irishman	irishman
irishmen	irishmen
irks	irk
irksome	irksom
iron	iron
irons	iron
irreconcil	irreconcil
irrecoverable	irrecover
irregular	irregular
irregulous	irregul

irreligious	irreligi
irremovable	irremov
irreparable	irrepar
irresolute	irresolut
irrevocable	irrevoc
is	is
isabel	isabel
isabella	isabella
isbel	isbel
isbels	isbel
iscariot	iscariot
ise	is
ish	ish
isidore	isidor
isis	isi
island	island
islander	island
islanders	island
islands	island
isle	isl
isles	isl
israel	israel
issu	issu
issue	issu
issued	issu
issueless	issueless
issues	issu
issuing	issu
ist	ist
ista	ista
it	it
italian	italian
italy	itali
itch	itch
itches	itch
itching	
	itch
item	item
items	item
iteration	iter
ithaca	ithaca
its	it
itself	itself
itshall	itshal
iv	iv
ivory	ivori
ivy	ivi
iwis	iwi

ix	ix
j	j
jacet	jacet
jack	jack
jackanapes	jackanap
jacks	jack
jacksauce	jacksauc
jackslave	jackslav
jacob	jacob
jade	jade
jaded	jade
jades	jade
jail	jail
jakes	jake
jamany	jamani
james	jame
jamy	jami
jane	jane
jangled	jangl
jangling	jangl
january	januari
janus	janu
japhet	japhet
jaquenetta	jaquenetta
jaques	jaqu
jar	jar
jarring	jar
jars	jar
jarteer	jarteer
jasons	jason
jaunce	jaunc
jauncing	jaunc
jaundice	jaundic
jaundies	jaundi
jaw	jaw
jawbone	jawbon
jaws	jaw
jay	jai
jays	jai
jc	jc
je	je
jealous	jealou
jealousies	jealou
jealousy	jealou
jeer	jeer
jeering	jeer
jelly	jelli
jenny	jenni

jeopardy	jeopardi
jephtha	jephtha
jephthah	jephthah
jerkin	jerkin
jerkins	jerkin
jerks	jerk
jeronimy	jeronimi
jerusalem	jerusalem
jeshu	jeshu
jesses	jess
jessica	jessica
jest	jest
jested	jest
jester	jester
jesters	jester
jesting	jest
jestes	jest
jesu	jesu
jesus	jesu
jet	jet
jets	jet
jew	jew
jewel	jewel
jeweller	jewel
jewels	jewel
jewess	jewess
jewish	jewish
jewry	jewri
jews	jew
jezebel	jezebel
jig	jig
jigging	jig
jill	jill
jills	jill
jingling	jingl
joan	joan
job	job
jockey	
jockey	
jocund	jocund
jog	jog
jogging	jog
john	john
johns	john
join	join
joinder	joinder
joined	join

joiner	joiner
joineth	joineth
joins	join
joint	joint
jointed	joint
jointing	joint
jointly	jointli
jointress	jointress
joints	joint
jointure	jointur
jollity	jolliti
jolly	jolli
jolt	jolt
joltheads	jolthead
jordan	jordan
joseph	joseph
joshua	joshua
jot	jot
jour	jour
jourdain	jourdain
journal	journal
journey	journei
journeying	journei
journeyman	
journeyman	
journeymen	journeymen
journeys	journei
jove	jove
jovem	jovem
joyial	joyial
jowl	jowl
jowls	jowl
joy	joi
joyed	joi
joyful	joy
joyfully	joyfulli
joyless	joyless
joyous	joyou
joys	joi
juan	juan
jud	jud
judas	juda
judases	judas
jude	jude
judg	judg
judge	judg
judged	judg
judgement	judgement

judges	judg
judgest	judgest
judging	judg
judgment	judgment
judgments	judgment
judicious	judici
jug	jug
juggle	juggl
juggled	
	juggl
juggler	juggler
jugglers	juggler
juggling	juggl
jugs	jug
juice	juic
juiced	juic
jul	jul
jule	jule
julia	julia
juliet	juliet
julietta	julietta
julio	julio
julius	juliu
july	juli
jump	jump
jumpeth	jumpeth
jumping	jump
jumps	jump
june	june
junes	june
junior	junior
junius	juniu
junkets	junket
juno	juno
jupiter	jupit
jure	jure
jurement	jurement
jurisdiction	jurisdict
juror	juror
jurors	juror
jury	juri
jurymen	
	jurymen
just	just
justeius	justeiu
justest	justest
justice	justic
justicer	justic

justicers	justic
justices	justic
justification	justif
justified	justifi
justify	justifi
justle	justl
justled	justl
justles	justl
justling	justl
justly	justli
justness	just
justs	just
jutting	jut
jutty	jutti
juvenal	juven
kam	kam
kate	kate
kated	kate
kates	kate
katharine	katharin
katherina	katherina
katherine	katherin
kecksies	kecksi
keech	keech
keel	keel
keels	keel
keen	
	keen
keenness	keen
keep	keep
keepdown	keepdown
keeper	keeper
keepers	keeper
keepest	keepest
keeping	keep
keeps	keep
keiser	keiser
ken	ken
kendal	kendal
kennel	kennel
kent	kent
kentish	kentish
kentishman	kentishman
kentishmen	kentishmen
kept	kept
kerchief	kerchief
kerely	kere
kern	kern

kernal	kernal
kernel	kernel
kernels	kernel
kerns	kern
kersey	kersei
kettle	kettl
kettledrum	kettledrum
kettledrums	kettledrum
key	kei
keys	kei
kibe	
kibe	
kibes	kibe
kick	kick
kicked	kick
kickshaws	kickshaw
kickshawses	kickshaws
kicky	kicki
kid	kid
kidney	kidnei
kikely	kike
kildare	kildar
kill	kill
killed	kill
killer	killer
killeth	killeth
killling	kill
killlingworth	killlingworth
kills	kill
kiln	kiln
kimbolton	kimbolton
kin	kin
kind	kind
kinder	kinder
kindest	kindest
kindle	kindl
kindled	kindl
kindless	kindless
kindlier	kindlier
kindling	kindl
kindly	kindli
kindness	kind
kindnesses	kind
kindred	
kindr	
kindreds	kindr
kinds	kind
kine	kine

king	king
kingdom	kingdom
kingdoms	kingdom
kingly	kingli
kings	king
kinred	kinr
kins	kin
kinsman	kinsman
kinsmen	kinsmen
kinswoman	kinswoman
kirtle	kirtl
kirtles	kirtl
kiss	kiss
kissed	kiss
kisses	kiss
kissing	kiss
kitchen	kitchen
kitchens	kitchen
kite	kite
kites	kite
kitten	kitten
kj	kj
kl	kl
klll	klll
knack	knack
knacks	knack
knapp	knapp
knav	knav
knave	knave
knaveries	knaveri
knavery	knaveri
knaves	knave
knavish	knavish
knead	knead
kneaded	knead
kneading	knead
knee	knee
kneel	kneel
kneeling	kneel
kneels	kneel
knees	knee
knell	knell
knew	knew
knewest	knewest
knife	knife
knight	knight
knighted	knight
knighthood	knighthood

knighthoods	knighthood
knightly	knightli
knights	knight
knit	knit
knits	knit
knitters	knitter
knitteth	knitteth
knives	knive
knobs	knob
knock	knock
knocking	knock
knocks	knock
knog	
	knog
knoll	knoll
knot	knot
knots	knot
knotted	knot
knotty	knotti
know	know
knower	knower
knowest	knowest
knowing	know
knowingly	knowingli
knowings	know
knowledge	knowledg
known	known
knows	know
l	l
la	la
laban	laban
label	label
labell	label
labienus	labienu
labio	labio
labor	labor
laboring	labor
labors	labor
labour	labour
laboured	labour
labourer	labour
labourers	labour
labouring	labour
labours	labour
laboursome	laboursom
labras	
	labra
labyrinth	labyrinth

lac	lac
lace	lace
laced	lace
lacedaemon	lacedaemon
laces	lace
lacies	laci
lack	lack
lackbeard	lackbeard
lacked	lack
lackey	lackei
lackeying	lackei
lackeys	lackei
lacking	lack
lacks	lack
lad	lad
ladder	ladder
ladders	ladder
lade	lade
laden	laden
ladies	ladi
lading	lade
lads	lad
lady	ladi
ladybird	ladybird
ladyship	ladyship
ladyships	ladyship
laer	laer
laertes	laert
lafeu	lafeu
lag	lag
lagging	
lag	
laid	laid
lain	lain
laissez	laissez
lake	lake
lakes	lake
lakin	lakin
lam	lam
lamb	lamb
lambert	lambert
lambkin	lambkin
lambkins	lambkin
lambs	lamb
lame	lame
lamely	lame
lameness	lame
lament	lament

lamentable	lament
lamentably	lament
lamentation	lament
lamentations	lament
lamented	lament
lamenting	lament
lamentings	lament
laments	lament
lames	lame
laming	lame
lammas	lamma
lammastide	lammastid
lamound	lamound
lamp	lamp
lampass	lampass
lamps	
lamp	
lanc	lanc
lancaster	lancast
lance	lanc
lances	lanc
lanceth	lanceth
lanch	lanch
land	land
landed	land
landing	land
landless	landless
landlord	landlord
landmen	landmen
lands	land
lane	lane
lanes	lane
langage	langag
langley	langlei
langton	langton
language	languag
languageless	languageless
languages	languag
langues	langu
languish	languish
languished	languish
languishes	languish
languishing	languish
languishings	languish
languishment	languish
languor	languor
lank	lank
lantern	

lantern	
lanterns	lantern
lanthorn	lanthorn
lap	lap
lapis	lapi
lapland	lapland
lapp	lapp
laps	lap
lapse	laps
lapsed	laps
lapsing	laps
lapwing	lapw
laquais	laquai
larded	lard
larder	larder
larding	lard
lards	lard
large	larg
largely	larg
largeness	larg
larger	larger
largess	largess
largest	largest
lark	lark
larks	lark
larron	larron
lartius	lartiu
larum	larum
larums	larum
las	la
lascivious	lascivi
lash	lash
lass	
lass	
lasses	lass
last	last
lasted	last
lasting	last
lastly	lastli
lasts	last
latch	latch
latches	latch
late	late
lated	late
lately	late
later	later
latest	latest
lath	lath

latin	latin
latten	latten
latter	latter
lattice	latic
laud	laud
laudable	laudabl
laudis	laudi
laugh	laugh
laughable	laughabl
laughed	laugh
laugher	laugher
laughest	laughest
laughing	laugh
laughs	laugh
laughter	laughter
launce	launc
launcelot	launcelot
launces	
launc	
launch	launch
laund	laund
laundress	laundress
laundry	laundri
laur	laur
laura	laura
laurel	laurel
laurels	laurel
laurence	laurenc
laus	lau
lavache	lavach
lave	lave
lavee	lave
lavender	lavend
lavina	lavina
lavinia	lavinia
lavish	lavish
lavishly	lavishli
lavolt	lavolt
lavoltas	lavolta
law	law
lawful	law
lawfully	lawfulli
lawless	lawless
lawlessly	lawlessli
lawn	lawn
lawns	lawn
lawrence	lawrenc
laws	law

lawyer	lawyer
lawyers	lawyer
lay	
	lai
layer	layer
layest	layest
laying	lai
lays	lai
lazar	lazar
lazars	lazar
lazarus	lazaru
lazy	lazi
lc	lc
ld	ld
ldst	ldst
le	le
lead	lead
leaden	leaden
leader	leader
leaders	leader
leadest	leadest
leading	lead
leads	lead
leaf	leaf
leagu	leagu
league	leagu
leagued	leagu
leaguer	leaguer
leagues	leagu
leah	leah
leak	leak
leaky	leaki
lean	lean
leander	leander
leaner	leaner
leaning	lean
leanness	lean
leans	lean
leap	leap
leaped	leap
leaping	leap
leaps	leap
leapt	leapt
lear	lear
learn	learn
learned	learn
learnedly	learnedli
learning	learn

learnings	learn
learns	learn
learnt	learnt
leas	lea
lease	leas
leases	leas
leash	leash
leasing	leas
least	least
leather	leather
leathern	leathern
leav	leav
leave	leav
leaven	leaven
leavening	leaven
leaver	leaver
leaves	leav
leaving	leav
leavy	leavi
lecher	lecher
lecherous	
lecher	
lechers	lecher
lechery	lecheri
lecon	lecon
lecture	lectur
lectures	lectur
led	led
leda	leda
leech	leech
leeches	leech
leek	leek
leeks	leek
leer	leer
leers	leer
lees	lee
leese	lees
leet	leet
leets	leet
left	left
leg	leg
legacies	legaci
legacy	legaci
legate	legat
legatine	legatin
lege	lege
legerity	leger
leges	lege

legg	legg
legion	legion
legions	legion
legitimate	legitim
legitimation	legitim
legs	
leg	
leicester	leicest
leicestershire	leicestershir
leiger	leiger
leigers	leiger
leisure	leisur
leisurely	leisur
leisures	leisur
leman	leman
lemon	lemon
lena	lena
lend	lend
lender	lender
lending	lend
lendings	lend
lends	lend
length	length
lengthen	lengthen
lengthens	lengthen
lengths	length
lenity	leniti
lennox	lennox
lent	lent
lenten	lenten
lentus	lentu
leo	leo
leon	leon
leonardo	leonardo
leonati	leonati
leonato	leonato
leonatus	leonatu
leontes	leont
leopard	leopard
leopards	leopard
leper	leper
leperous	leper
lepidus	lepidu
leprosy	leprosi
lequel	lequel
lers	ler
les	le
less	less

lessen	lessen
lessens	lessen
lesser	lesser
lesson	lesson
lessoned	lesson
lessons	lesson
lest	lest
lestrake	lestrak
let	let
lethargied	lethargi
lethargies	lethargi
lethargy	lethargi
lethe	leth
lets	let
lett	lett
letter	letter
letters	letter
letting	let
lettuce	lettuc
leur	leur
leve	leve
level	level
levell	level
levelled	level
levels	level
leven	leven
levers	lever
leviathan	leviathan
leviathans	leviathan
levied	levi
levies	levi
levity	leviti
levy	levi
levying	levi
lewd	lewd
lewdly	lewdli
lewdness	lewd
lewdsters	lewdster
lewis	lewi
liable	liabl
liar	liar
liars	liar
libbard	libbard
libelling	libel
libels	libel
liberal	liber
liberality	liber
liberte	libert

liberties	liberti
libertine	libertin
libertines	libertin
liberty	liberti
library	librari
libya	
libya	
licence	licenc
licens	licen
license	licens
licentious	licenti
lichas	licha
licio	licio
lick	lick
licked	lick
licker	licker
lictors	lictor
lid	lid
lids	lid
lie	lie
lied	li
lief	lief
liefest	liefest
liege	lieg
liegeman	liegeman
liegemen	liegemen
lien	lien
lies	li
liest	liest
lieth	lieth
lieu	lieu
lieutenant	lieuten
lieutenantry	lieutenantri
lieutenants	lieuten
lieve	liev
life	life
lifeblood	lifeblood
lifeless	lifeless
lifelings	
lifel	
lift	lift
lifted	lift
lifter	lifter
lifteth	lifteth
lifting	lift
lifts	lift
lig	lig
ligarius	ligariu

liggens	liggen
light	light
lighted	light
lighten	lighten
lightens	lighten
lighter	lighter
lightest	lightest
lightly	lightli
lightness	light
lightning	lightn
lightnings	lightn
lights	light
lik	lik
like	like
liked	like
likeliest	likeliest
likelihood	likelihood
likelihoods	likelihood
likely	like
likeness	like
liker	liker
likes	like
likest	likest
likewise	likewis
liking	like
likings	like
lilies	lili
lily	lili
lim	lim
limander	limand
limb	limb
limbeck	limbeck
limbecks	limbeck
limber	limber
limbo	limbo
limbs	limb
lime	lime
limed	lime
limehouse	limehous
limekilns	limekiln
limit	limit
limitation	limit
limited	limit
limits	limit
limn	limn
limp	limp
limping	limp
limps	limp

lin	lin
lincoln	lincoln
lincolnshire	lincolnshir
line	line
lineal	lineal
lineally	lineal
lineament	lineament
lineaments	lineament
lined	line
linen	linen
linens	linen
lines	line
ling	ling
lingare	lingar
linger	linger
lingered	linger
lingers	linger
linguist	linguist
lining	line
link	link
links	link
linsey	linsei
linstock	linstock
linta	linta
lion	lion
lionel	lionel
lioness	lioness
lions	lion
lip	lip
lipp	lipp
lips	lip
lipsbury	lipsburi
liquid	liquid
liquor	liquor
liquorish	liquorish
liquors	liquor
lirra	lirra
lisbon	lisbon
lisp	
lisp	
lisping	lisp
list	list
listen	listen
listening	listen
lists	list
literated	literatur
lither	lither
litter	litter

little	littl
littlest	littlest
liv	liv
live	live
lived	live
livelier	liveri
livelihood	livelihood
livelong	livelong
lively	live
liver	liver
liveries	liveri
livers	liver
livery	liveri
lives	live
livest	livest
liveth	liveth
livia	livia
living	live
livings	live
lizard	lizard
lizards	lizard
ll	ll
lll	lll
llous	
llou	
lnd	lnd
lo	lo
loa	loa
loach	loach
load	load
loaden	loaden
loading	load
loads	load
loaf	loaf
loam	loam
loan	loan
loath	loath
loathe	loath
loathed	loath
loather	loather
loathes	loath
loathing	loath
loathly	loathli
loathness	loath
loathsome	loathsom
loathsomeness	loathsom
loathsomest	loathsomest
loaves	loav

lob	lob
lobbies	lobbi
lobby	lobbi
local	local
lochaber	lochab
lock	lock
locked	lock
locking	lock
lockram	lockram
locks	lock
locusts	locust
lode	lode
lodg	lodg
lodge	lodg
lodged	lodg
lodgers	lodger
lodges	lodg
lodging	lodg
lodgings	lodg
lodovico	lodovico
lodowick	lodowick
lofty	lofti
log	log
logger	logger
loggerhead	loggerhead
loggerheads	loggerhead
loggets	logget
logic	logic
logs	log
loins	loin
loiter	loiter
loiterer	loiter
loiterers	loiter
loitering	loiter
lolling	loll
lolls	loll
lombardy	lombardi
london	london
londoners	london
lone	lone
loneliness	
loneli	
lonely	lone
long	long
longaville	longavil
longboat	longboat
longed	long
longer	longer

longest	longest
longeth	longeth
longing	long
longings	long
longly	longli
longs	long
longtail	longtail
loo	loo
loof	loof
look	look
looked	look
looker	looker
lookers	looker
lookest	lookest
looking	look
looks	look
loon	loon
loop	loop
loos	loo
loose	loos
loosed	loos
loosely	loos
loosen	loosen
loosing	loos
lop	lop
lopp	lopp

loquitur	loquitur
lord	lord
lorded	lord
lording	lord
lordings	lord
lordliness	lordli
lordly	lordli
lords	lord
lordship	lordship
lordships	lordship
lorenzo	lorenzo
lorn	lorn
lorraine	lorrain
lorship	lorship
los	lo
lose	lose
loser	loser
losers	loser
loses	lose
losest	losest
loseth	loseth

losing	lose
loss	loss
losses	loss
lost	lost
lot	lot
lots	lot
lott	lott
lottery	lotteri
loud	loud
louder	louder
loudly	loudli
lour	
	lour
loureth	loureth
louring	lour
louse	lous
louses	lous
lousy	lousi
lout	lout
louted	lout
louts	lout
louvre	louvr
lov	lov
love	love
loved	love
lovedst	lovedst
lovel	lovel
lovelier	loveli
loveliness	loveli
lovell	lovel
lovely	love
lover	lover
loved	lover
lovers	lover
loves	love
lovest	lovest
loveth	loveth
loving	love
lovingly	lovingli
low	low
lowe	low
lower	lower
lowest	lowest
lowing	low
lowliness	
lowli	
lowly	lowli
lown	lown

lowness	low
loyal	loyal
loyally	loyal
loyalties	loyalti
loyalty	loyalti
lozel	lozel
lt	lt
lubber	lubber
lubberly	lubberli
luc	luc
luccicos	luccico
luce	luce
lucentio	lucentio
luces	luce
lucetta	lucetta
luciana	luciana
lucianus	lucianu
lucifer	lucif
lucifier	lucifi
lucilius	luciliu
lucina	lucina
lucio	lucio
lucius	luciu
luck	luck
luckier	luckier
luckiest	luckiest
luckily	luckili
luckless	luckless
lucky	lucki
lucre	
	lucr
lucrece	lucrec
lucretia	lucretia
lucullius	luculliu
lucullus	lucullu
lucy	luci
lud	lud
ludlow	ludlow
lug	lug
lugg	lugg
luggage	luggag
luke	luke
lukewarm	lukewarm
lull	lull
lulla	lulla
lullaby	lullabi
lulls	lull
lumbert	lumbert

lump	lump
lumpish	lumpish
luna	luna
lunacies	lunaci
lunacy	lunaci
lunatic	lunatic
lunatics	lunatic
lunes	lune
lungs	lung
lupercal	luperc
lurch	lurch
lure	lure
lurk	lurk
lurketh	lurketh
lurking	
lurk	
lurks	lurk
luscious	luscious
lush	lush
lust	lust
lusted	lust
luster	luster
lustful	lust
lustier	lustier
lustiest	lustiest
lustig	lustig
lustihood	lustihood
lustily	lustily
lustre	lustre
lustrous	lustrous
lusts	lust
lusty	lust
lute	lute
lutes	lute
lutestring	lutestring
lutheran	lutheran
luxurious	luxuri
luxuriously	luxuri
luxury	luxuri
ly	ly
lycaonia	lycaonia
lycurguses	lycurgus
lydia	lydia
lye	lye
lyen	lyen
lying	ly
lym	lym
lymoges	

lymog	
lynn	lynn
lysander	lysand
m	m
ma	ma
maan	maan
mab	mab
macbeth	macbeth
maccabaeus	maccabaeu
macdonwald	macdonwald
macduff	macduff
mace	mace
macedon	macedon
maces	mace
machiavel	machiavel
machination	machin
machinations	machin
machine	machin
mack	mack
macmorris	macmorri
maculate	macul
maculation	macul
mad	mad
madam	madam
madame	madam
madams	madam
madcap	madcap
madded	mad
madding	mad
made	made
madeira	madeira
madly	madli
madman	
madman	
madmen	madmen
madness	mad
madonna	madonna
madrigals	madrig
mads	mad
maecenas	maecena
maggot	maggot
maggots	maggot
magic	magic
magical	magic
magician	magician
magistrate	magistr
magistrates	magistr
magnanimity	magnanim

magnanimous	magnanim
magni	magni
magnifi	magnifi
magnificence	magnific
magnificent	magnific
magnifico	magnifico
magnificoes	magnifico
magnus	magnu
mahomet	mahomet
mahu	mahu
maid	maid
maiden	maiden
maidenhead	maidenhead
maidenheads	maidenhead
maidenhood	maidenhood
maidenhoods	maidenhood
maidenliest	maidenliest
maidenly	maidenli
maidens	maiden
maidhood	maidhood
maids	maid
mail	mail
mailed	mail
mails	mail
maim	maim
maimed	maim
maims	maim
main	main
maincourse	maincours
maine	main
mainly	mainli
mainmast	mainmast
mains	main
maintain	maintain
maintained	maintain
maintains	maintain
maintenance	mainten
mais	mai
maison	maison
majestas	majesta
majestee	majeste
majestic	majest
majestical	majest
majestically	majest
majesties	majesti
majesty	majesti
major	major

majority	major
mak	mak
make	make
makeless	makeless
maker	maker
makers	maker
makes	make
makest	makest
maketh	maketh
making	make
makings	make
mal	mal
mala	mala
maladies	maladi
malady	maladi
malapert	malapert
malcolm	malcolm
malcontent	malcont
malcontents	malcont
male	male
maledictions	maledict
malefactions	malefact
malefactor	malefactor
malefactors	malefactor
males	male
malevolence	malevol
malevolent	malevol
malhecho	malhecho
malice	malic
malicious	malici
maliciously	malici
malign	
	malign
malignancy	malign
malignant	malign
malignantly	malignantli
malkin	malkin
mall	mall
mallard	mallard
mallet	mallet
mallows	mallow
malmsey	malmsei
malt	malt
maltworms	maltworm
malvolio	malvolio
mamillius	mamilliu
mammering	mammer
mammet	mammet

mammets	mammet
mammoth	mammoth
man	man
manacle	manacle
manacles	manacles
manage	manage
managed	managed
manager	manager
managing	managing
manakin	manakin
manchus	manchu
mandate	mandate
mandragora	mandragora
mandrake	mandrake
mandrakes	mandrakes

mane	mane
manent	manent
manes	manes
manet	manet
manfully	manfully
mangle	mangle
mangled	mangled
mangles	mangles
mangling	mangling
mangy	mangy
manhood	manhood
manhoods	manhoods
manifest	manifest
manifested	manifested
manifests	manifests
manifold	manifold
manifoldly	manifoldly
manka	manka
mankind	mankind
manlike	manlike
manly	manly
mann	mann
manna	manna
manner	manner
mannerly	mannerly
manners	manners
manningtree	manningtree
mannish	mannish
manor	manor
manors	manors
mans	man
mansion	

mansion	
mansionry	mansionri
mansions	mansion
manslaughter	manslaught
mantle	mantl
mantled	mantl
mantles	mantl
mantua	mantua
mantuan	mantuan
manual	manual
manure	manur
manured	manur
manus	manu
many	mani
map	map
mapp	mapp
maps	map
mar	mar
marble	marbl
marbled	marbl
marcade	marcad
marcellus	marcellu
march	march
marches	march
marcheth	marcheth
marching	march
marchioness	marchio
marchpane	marchpan
marcians	marcian
marcius	marciu
marcus	marcu
mardian	
mardian	
mare	mare
mares	mare
marg	marg
margarelon	margarelon
margaret	margaret
marge	marg
margent	margent
margery	margeri
maria	maria
marian	marian
mariana	mariana
maries	mari
marigold	marigold
mariner	marin
mariners	marin

maritime	maritim
marjoram	marjoram
mark	mark
marked	mark
market	market
marketable	market
marketplace	marketplac
markets	market
marking	mark
markman	markman
marks	mark
marl	marl
marle	marl
marmoset	marmoset
marquess	marquess
marquis	marqui
marr	marr
marriage	marriag
marriages	marriag
married	marri
marries	marri
marring	mar
marrow	marrow
marrowless	marrowless
marrows	marrow
marry	marri
marrying	marri
mars	mar
marseilles	marseil
marsh	marsh
marshal	marshal
marshalsea	marshalsea
marshalship	marshalship
mart	mart
marted	mart
martem	martem
martext	martext
martial	martial
martin	martin
martino	martino
martius	martiu
martlemas	martlema
martlet	martlet
marts	mart
martyr	martyr
martyrs	martyr
marullus	marullu

marv	marv
marvel	marvel
marvell	marvel
marvellous	marvel
marvellously	marvel
marvels	marvel
mary	mari
mas	ma
masculine	masculin
masham	masham
mask	mask
masked	mask
masker	masker
maskers	masker
masking	mask
masks	mask
mason	mason
masonry	masonri
masons	mason
masque	masqu
masquers	masquer
masques	masqu
masquing	masqu
mass	mass
massacre	massacr
massacres	massacr
masses	mass
massy	massi
mast	mast
master	master
master	master
masterdom	masterdom
masterest	masterest
masterless	masterless
masterly	masterli
masterpiece	masterpiec
masters	master
mastership	mastership
mastic	mastic
mastiff	mastiff
mastiffs	mastiff
masts	mast
match	match
matches	match
matcheth	matcheth
matching	match
matchless	matchless
mate	mate

mated	mate
mater	mater
material	materi
mates	mate
mathematics	mathemat
matin	matin
matron	matron
matrons	matron
matter	matter
matters	matter
matthew	matthew
mattock	mattock
mattress	mattress
mature	matur
maturity	
matur	
maud	maud
maudlin	maudlin
maugre	maugr
maul	maul
maund	maund
mauri	mauri
mauritania	mauritania
mauvais	mauvai
maw	maw
maws	maw
maxim	maxim
may	mai
mayday	maydai
mayest	mayest
mayor	mayor
maypole	maypol
mayst	mayst
maz	maz
maze	maze
mazed	maze
mazes	maze
mazzard	mazzard
me	me
meacock	meacock
mead	mead
meadow	meadow
meadows	meadow
meads	mead
meagre	meagr
meal	meal
meals	meal
mealy	meali

mean	mean
meanders	meander
meaner	meaner
meanest	meanest
meaneth	meaneth
meaning	mean
meanings	mean
meanly	meanli
means	mean
meant	meant
meantime	meantim
meanwhile	meanwhil
measles	measl
measur	measur
measurable	measur
measure	measur
measured	measur
measureless	measureless
measures	measur
measuring	measur
meat	meat
meats	meat
mechanic	mechan
mechanical	mechan
mechanicals	mechan
mechanics	mechan
mechante	mechant
med	med
medal	medal
meddle	meddl
meddler	meddler
meddling	
meddl	
mede	mede
medea	medea
media	media
mediation	mediat
mediators	mediat
medice	medic
medicinal	medicin
medicine	medicin
medicines	medicin
meditate	medit
meditates	medit
meditating	medit
meditation	medit
meditations	medit

mediterranean	mediterranean
mediterraneum	mediterraneum
medlar	medlar
medlars	medlar
meed	meed
meeds	meed
meek	meek
meekly	meekli
meekness	meek
meet	meet
meeter	meeter
meetest	meetest
meeting	meet
meetings	meet
meetly	meetli
meetness	meet
meets	meet

meg	meg
mehercle	mehercl
meilleur	meilleur
meiny	meini
meisen	meisen
melancholies	melancholi
melancholy	melancholi
melford	melford
mell	mell
mellifluous	melliflu
mellow	mellow
mellowing	mellow
melodious	melodi
melody	melodi
melt	melt
melted	melt
melteth	melteth
melting	melt
melts	melt
melun	melun
member	member
members	member
memento	memento
memorable	memor
memorandums	memorandum
memorial	memori
memorials	memori
memories	memori
memoriz	memoriz
memorize	memor

memory	memori
memphis	
memphi	
men	men
menac	menac
menace	menac
menaces	menac
menaphon	menaphon
menas	mena
mend	mend
mended	mend
mender	mender
mending	mend
mends	mend
menecrates	menecr
menelaus	menelau
menenius	meneniu
mental	mental
menteith	menteith
mention	mention
mentis	menti
menton	menton
mephostophilus	mephostophilu
mer	mer
mercatante	mercatant
mercatio	mercatio
mercenaries	mercenari
mercenary	mercenari
mercer	mercer
merchandise	merchandis
merchandized	merchand
merchant	merchant
merchants	merchant
mercies	merci
merciful	merci
mercifully	mercifulli
merciless	merciless
mercurial	mercuri
mercuries	mercuri
mercury	mercuri
mercutio	mercutio
mercy	merci
mere	mere
mered	mere
merely	mere
merest	merest
meridian	meridian
merit	merit

merited	merit
meritorious	meritori
merits	merit
merlin	merlin
mermaid	mermaid
mermaids	mermaid
merops	merop
merrier	merrier
merriest	merriest
merrily	merrili
merriman	merriman
merriment	merriment
merriments	merriment
merriness	merri
merry	merri
mervailous	mervail
mes	me
mesh	mesh
meshes	mesh
mesopotamia	mesopotamia
mess	mess
message	messag
messages	messag
messala	messala
messaline	messalin
messenger	messeng
messengers	messeng
messes	mess
messina	messina
met	met
metal	metal
metals	metal
metamorphis	metamorphi
metamorphoses	metamorphos
metaphor	metaphor
metaphysical	metaphys
metaphysics	metaphys
mete	mete
metellus	metellu
meteor	meteor
meteors	meteor
meteyard	meteyard
metheglin	metheglin
metheglins	metheglin
methink	methink
methinks	methink
method	

method	
methods	method
methought	methought
methoughts	methought
metre	metr
metres	metr
metropolis	metropoli
mette	mett
mettle	mettl
mettled	mettl
meus	meu
mew	mew
mewed	mew
mewling	mewl
mexico	mexico
mi	mi
mice	mice
michael	michael
michaelmas	michaelma
micher	micher
miching	mich
mickle	mickl
microcosm	microcosm
mid	mid
midas	mida
middest	middest
middle	middl
middleham	middleham
midnight	midnight
midriff	midriff
midst	midst
midsummer	midsumm
midway	midwai
midwife	midwif
midwives	midwiv
mienne	mienn
might	might
mightful	might
mightier	mightier
mightiest	mightiest
mightily	mightili
mightiness	mighti
mightst	mightst
mighty	mighti
milan	milan
milch	milch
mild	mild

milder	milder
mildest	mildest
mildew	mildew
mildews	mildew
mildly	mildli
mildness	mild
mile	mile
miles	mile
milford	milford
militarist	militarist
military	militari
milk	milk
milking	milk
milkmaid	milkmaid
milks	milk
milksops	milksop
milky	
	milki
mill	mill
mille	mill
miller	miller
milliner	millin
million	million
millioned	million
millions	million
mills	mill
millstones	millston
milo	milo
mimic	mimic
minc	minc
mince	minc
minces	minc
mincing	minc
mind	mind
minded	mind
mindng	mind
mindless	mindless
minds	mind
mine	mine
mineral	miner
minerals	miner
minerva	minerva
mines	mine
mingle	mingl
mingled	mingl
mingling	mingl
minikin	minikin
minim	minim

minime	minim
minimo	
minimo	
minimus	minimu
mining	mine
minion	minion
minions	minion
minist	minist
minister	minist
ministers	minist
ministration	ministr
minnow	minnow
minnows	minnow
minola	minola
minority	minor
minos	mino
minotaurs	minotaur
minstrel	minstrel
minstrels	minstrel
minstrelsy	minstrelsi
mint	mint
mints	mint
minute	minut
minutely	minut
minutes	minut
minx	minx
mio	mio
mir	mir
mirable	mirabl
miracle	miracl
miracles	miracl
miraculous	miracul
miranda	miranda
mire	mire
mirror	mirror
mirrors	mirror
mirth	mirth
mirthful	mirth
miry	miri
mis	mi
misadventur	misadventur
misadventure	misadventur
misanthropos	misanthropo
misapplied	misappli
misbecame	misbecam
misbecom	misbecom
misbecome	misbecom
misbegot	misbegot

misbegotten	misbegotten
misbeliever	misbeliev
misbelieving	misbeliev
misbhav	misbhav
miscall	miscal
miscalled	miscal
miscarried	miscarri
miscarries	miscarri
miscarry	miscarri
miscarrying	miscarri
mischance	mischanc
mischances	mischanc
mischief	mischief
mischiefs	mischief
mischievous	mischiev
misconceived	
misconceiv	
misconst	misconst
misconster	misconst
misconstruction	misconstruct
misconstrued	misconstru
misconstrues	misconstru
miscreant	miscreant
miscreate	miscreat
misdeed	misde
misdeeds	misde
misdemean	misdemean
misdemeanours	misdemeanour
misdoubt	misdoubt
misdoubteth	misdoubteth
misdoubts	misdoubt
misenum	misenum
miser	miser
miserable	miser
miserably	miser
misericorde	misericord
miseries	miseri
misers	miser
misery	miseri
misfortune	misfortun
misfortunes	misfortun
misgive	misgiv
misgives	misgiv
misgiving	misgiv
misgoverned	misgovern
misgovernment	misgovern
misgraffed	

misgraf	
misguide	misguid
mishap	mishap
mishaps	mishap
misheard	misheard
misinterpret	misinterpret
mislead	mislead
misleader	mislead
misleaders	mislead
misleading	mislead
misled	misl
mislike	mislik
misord	misord
misplac	misplac
misplaced	misplac
misplaces	misplac
mispris	mispri
misprised	mispris
misprision	mispris
misprizing	mispriz
misproud	misproud
misquote	misquot
misreport	misreport
miss	miss
missed	miss
misses	miss
misshap	misshap
misshapen	misshapen
misshathed	misshath
missing	miss
missingly	
missingli	
missions	mission
missive	missiv
missives	missiv
misspoke	misspok
mist	mist
mista	mista
mistak	mistak
mistake	mistak
mistaken	mistaken
mistakes	mistak
mistaketh	mistaketh
mistaking	mistak
mistakings	mistak
mistemp	mistemp
mistempered	mistemp
misterm	misterm

mistful	mist
misthink	misthink
misthought	misthought
mistletoe	mistleto
mistook	mistook
mistreadings	mistread
mistress	mistress
mistresses	mistress
mistresss	mistresss
mistriship	mistriship
mistrust	mistrust
mistrusted	mistrust
mistrustful	mistrust
mistrusting	mistrust
mists	mist
misty	misti
misus	misu
misuse	misus
misused	misus
misuses	misus
mites	mite
mithridates	mithrid
mitigate	mitig
mitigation	mitig
mix	mix
mixed	mix
mixture	mixtur
mixtures	mixtur
mm	mm
mnd	mnd
moan	moan
moans	moan
moat	moat
moated	moat
mobled	mobl
mock	mock
mockable	mockabl
mocker	mocker
mockeries	mockeri
mockers	mocker
mockery	mockeri
mocking	mock
mocks	mock
mockvater	mockvat
mockwater	mockwat
model	model
modena	

modena	
moderate	moder
moderately	moder
moderation	moder
modern	modern
modest	modest
modesties	modesti
modestly	modestli
modesty	modesti
modicums	modicum
modo	modo
module	modul
moe	moe
moi	moi
moiety	moieti
moist	moist
moisten	moisten
moisture	moistur
moldwarp	moldwarp
mole	mole
molehill	molehil
moles	mole
molest	molest
molestation	molest
mollification	mollif
mollis	molli
molten	molten
molto	molto
mome	mome
moment	moment
momentary	momentari
moming	
mome	
mon	mon
monachum	monachum
monarch	monarch
monarchies	monarchi
monarchize	monarch
monarcho	monarcho
monarchs	monarch
monarchy	monarchi
monast	monast
monastery	monasteri
monastic	monast
monday	mondai
monde	mond
money	monei
moneys	monei

mong	mong
monger	monger
mongers	monger
monging	mong
mongrel	mongrel
mongrels	mongrel
mongst	mongst
monk	monk
monkey	monkei
monkeys	monkei
monks	monk
monmouth	monmouth
monopoly	monopoli
mons	mon
monsieur	monsieur
monsieurs	monsieur
monster	monster
monsters	monster
monstrous	monstrou
monstrously	monstrous
monstrousness	monstrous
monstruosity	monstruos
montacute	montacut
montage	montag
montague	montagu
montagues	montagu
montano	montano
montant	montant
montez	montez
montferrat	montferrat
montgomery	montgomeri
month	month
monthly	monthli
months	month
montjoy	montjoi
monument	monument
monumental	monument
monuments	monument
mood	mood
moods	mood
moody	moodi
moon	moon
moonbeams	moonbeam
moonish	moonish
moonlight	moonlight
moons	moon
moonshine	

moonshin	
moonshines	moonshin
moor	moor
moorfields	moorfield
moors	moor
moorship	moorship
mop	mop
mope	mope
moping	mope
mopping	mop
mopsa	mopsa
moral	moral
moraler	moral
morality	moral
moralize	moral
mordake	mordak
more	more
moreover	moreov
mores	more
morgan	morgan
mori	mori
morisco	morisco
morn	morn
morning	morn
mornings	morn
morocco	morocco
morris	morri
morrow	morrow
morrows	morrow
morsel	morsel
morsels	morsel
mort	mort
mortal	mortal
mortality	mortal
mortally	mortal
mortals	mortal
mortar	mortar
mortgaged	mortgag
mortified	mortifi
mortifying	mortifi
mortimer	mortim
mortimers	mortim
mortis	morti
mortise	mortis
morton	morton
mose	mose
moss	moss

mossgrown	mossgrown
most	most
mote	mote
moth	moth
mother	mother
mothers	mother
moths	moth
motion	motion
motionless	motionless
motions	motion
motive	motiv
motives	motiv
motley	motlei
mots	mot
mought	mought
mould	mould
moulded	
mould	
mouldeth	mouldeth
moulds	mould
mouldy	mouldi
moult	moult
moulten	moulten
mouch	mouch
mounseur	mounseur
mounsieur	mounsieur
mount	mount
mountain	mountain
mountaineer	mountain
mountaineers	mountain
mountainous	mountain
mountains	mountain
mountant	mountant
mountanto	mountanto
mountebank	mountebank
mountebanks	mountebank
mounted	mount
mounteth	mounteth
mounting	mount
mounts	mount
mourn	mourn
mourned	mourn
mourner	mourner
mourners	mourner
mournful	mourn
mournfully	mournfulli
mourning	mourn
mourningly	mourningli

mournings	mourn
mourns	mourn
mous	mou
mouse	mous
mousetrap	mousetrap
mousing	mous
mouth	mouth
mouthed	mouth
mouths	mouth
mov	mov
movables	movabl
move	move
moveable	moveabl
moveables	moveabl
moved	move
mover	mover
movers	mover
moves	move
moveth	moveth
moving	move
movingly	movingli
movousus	movousu
mow	mow
mowbray	mowbrai
mower	mower
mowing	mow
mows	mow
moy	moi
moys	moi
moyses	moys
mrs	mr
much	much
muck	
muck	
mud	mud
mudded	mud
muddied	muddi
muddy	muddi
muffins	muffin
muffl	muffl
muffle	muffl
muffled	muffl
muffler	muffler
muffling	muffl
mugger	mugger
mugs	mug
mulberries	mulberri
mulberry	mulberri

mule	mule
mules	mule
muleteers	mulet
mulier	mulier
mulieres	mulier
muliteus	muliteu
mull	mull
mulmutius	mulmutiu
multiplied	multipli
multiply	multipli
multiplying	multipli
multipotent	multipot
multitude	multitud
multitudes	multitud
multitudinous	multitudin
mum	mum
mumble	
mumbl	
mumbling	mumbl
mummers	mummer
mummy	mummi
mun	mun
munch	munch
muniments	muniment
munition	munit
murd	murd
murder	murder
murdered	murder
murderer	murder
murderers	murder
murdering	murder
murderous	murder
murders	murder
mure	mure
murk	murk
murkiest	murkiest
murky	murki
murmur	murmur
murmurers	murmur
murmuring	murmur
murrain	murrain
murray	murrai
murrion	murrion
murther	murther
murtherer	murther
murtherers	murther
murthering	murther
murtherous	murther

murthers	murther
mus	mu
muscadel	muscadel
muscovites	muscovit
muscovits	muscovit
muscovy	muscovi
muse	muse
muses	muse
mush	mush
mushrooms	mushroom
music	music
musical	music
musician	musician
musicians	musician
musics	music
musing	muse
musings	muse
musk	musk
musket	musket
muskets	musket
muskos	musko
muss	muss
mussel	mussel
mussels	mussel
must	must
mustachio	mustachio
mustard	mustard
mustardseed	mustardse
muster	muster
mustering	muster
musters	muster
musty	musti
mutability	
mutabl	
mutable	mutabl
mutation	mutat
mutations	mutat
mute	mute
mutes	mute
mutest	mutest
mutine	mutin
mutineer	mutin
mutineers	mutin
mutines	mutin
mutinies	mutini
mutinous	mutin
mutiny	mutini

mutius	mutiu
mutter	mutter
muttered	mutter
mutton	mutton
muttons	mutton
mutual	mutual
mutualities	mutual
mutually	mutual
muzzl	muzzl
muzzle	muzzl
muzzled	muzzl
mv	mv
mww	mww
my	my
mynheers	mynheer
myrmidon	myrmidon
myrmidons	myrmidon
myrtle	myrtl
myself	
myself	
myst	myst
mysteries	mysteri
mystery	mysteri
n	n
nag	nag
nage	nage
nags	nag
naiads	naiad
nail	nail
nails	nail
nak	nak
naked	nake
nakedness	naked
nal	nal
nam	nam
name	name
named	name
nameless	nameless
namely	name
names	name
namest	namest
naming	name
nan	nan
nance	nanc
nap	nap
nape	nape
napes	nape
napkin	napkin

napkins	napkin
naples	napl
napless	napless
napping	nap
naps	
nap	
narbon	narbon
narcissus	narcissu
narines	narin
narrow	narrow
narrowly	narrowli
naso	naso
nasty	nasti
nathaniel	nathaniel
natifs	natif
nation	nation
nations	nation
native	nativ
nativity	nativ
natur	natur
natural	natur
naturalize	natur
naturally	natur
nature	natur
natured	natur
natures	natur
natus	natu
naught	naught
naughtily	naughtili
naughty	naughti
navarre	navarr
nave	nave
navel	navel
navigation	navig
navy	navi
nay	nai
nayward	nayward
nayword	nayword
nazarite	nazarit
ne	ne
neaf	neaf
neamnoin	neamnoin
neanmoin	neanmoin
neapolitan	neapolitan
neapolitans	neapolitan
near	near
nearer	nearer

nearest	nearest
nearly	nearli
nearness	near
neat	neat
neatly	neatli
neb	neb
nebour	nebour
nebuchadnezzar	nebuchadnezzar
nec	nec
necessaries	necessari
necessarily	necessarili
necessary	necessari
necessitied	necess
necessities	necess
necessity	necess
neck	neck
necklace	necklac
necks	neck
nectar	nectar
ned	ned
nedar	nedar
need	need
needed	need
needer	needer
needful	need
needfull	needful
needing	need
needle	needl
needles	needl
needless	needless
needly	needli
needs	need
needy	needi
neer	neer
neeze	neez
nefas	nefa
negation	negat
negative	neg
negatives	neg
neglect	neglect
neglected	neglect
neglecting	neglect
neglectingly	neglectingli
neglection	neglect
negligence	neglig
negligent	neglig
negotiate	negoti

negotiations	negoti
negro	negro
neigh	neigh
neighbors	neighbor
neighbour	neighbour
neighbourhood	
neighbourhood	
neighbouring	neighbour
neighbourly	neighbourli
neighbours	neighbour
neighing	neigh
neighs	neigh
neither	neither
nell	nell
nemean	nemean
nemesis	nemesi
neoptolemus	neoptolemu
nephew	nephew
nephews	nephew
neptune	neptun
ner	ner
nerides	nereid
nerissa	nerissa
nero	nero
neroes	nero
ners	ner
nerve	nerv
nerves	nerv
nervii	nervii
nervy	nervi
nessus	nessu
nest	nest
nestor	nestor
nests	nest
net	net
nether	nether
netherlands	netherland
nets	net
nettle	nettl
nettled	nettl
nettles	nettl
neuter	neuter
neutral	neutral
nev	nev
never	never
nevil	nevil
nevils	nevil
new	new

newborn	newborn
newer	newer
newest	newest
newgate	newgat
newly	newli
newness	new
news	new
newsmongers	newsmong
newt	newt
newts	newt
next	next
nibbling	nibbl
nicanor	nicanor
nice	nice
nicely	nice
niceness	nice
nicer	nicer
nicety	niceti
nicholas	nichola
nick	nick
nickname	nicknam
nicks	nick
niece	
	niec
nieces	niec
niggard	niggard
niggarding	niggard
niggardly	niggardli
nigh	nigh
night	night
nightcap	nightcap
nightcaps	nightcap
nighted	night
nightgown	nightgown
nightingale	nightingal
nightingales	nightingal
nightly	nightli
nightmare	nightmar
nights	night
nightwork	nightwork
nihil	nihil
nile	nile
nill	nill
nilus	nilu
nimble	nimbl
nimbleness	nimbl
nimbler	nimbler
nimbly	nimbl

nine	nine
nineteen	nineteen
ning	ning
ningly	ningli
ninny	ninni
ninth	ninth
ninus	
	ninu
niobe	niob
niobes	niob
nip	nip
nipp	nipp
nipping	nip
nipple	nippl
nips	nip
nit	nit
nly	nly
nnight	nnight
nights	nnight
no	no
noah	noah
nob	nob
nobility	nobil
nobis	nobi
noble	nobl
nobleman	nobleman
noblemen	noblemen
nobleness	nobl
nobler	nobler
nobles	nobl
noblesse	nobless
noblest	noblest
nobly	nobli
nobody	nobodi
noces	noce
nod	nod
nodded	nod
nodding	nod
noddle	noddl
noddles	noddl
noddy	noddi
nods	nod
noes	noe
nointed	noint
nois	noi
noise	nois
noiseless	noiseless

noisemaker	noisemak
noises	nois
noisome	noisom
nole	nole
nominate	nomin
nominated	nomin
nomination	nomin
nominativo	nominativo
non	non
nonage	nonag
nonce	nonc
none	none
nonino	nonino
nonny	nonni
nonpareil	nonpareil
nonsuits	nonsuit
nony	noni
nook	nook
nooks	nook
noon	noon
noonday	noondai
noontide	noontid
nor	nor
norbery	norberi
norfolk	norfolk
norman	norman
normandy	normandi
normans	norman
north	north
northampton	northampton
northamptonshire	northamptonshir
northerly	northerli
northern	northern
northgate	northgat
northumberland	northumberland
northumberlands	northumberland
northward	northward
norway	norwai
norways	norwai
norwegian	norwegian
norweyan	norweyan
nos	no
nose	nose
nosegays	nosegai
noseless	noseless
noses	nose
noster	noster

nostra	nostra
nostril	nostril
nostrils	nostril
not	not
notable	notabl
notably	notabl
notary	notari
notch	notch

note	note
notebook	notebook
noted	note
notedly	notedli
notes	note
notest	notest
noteworthy	noteworthy
nothing	noth
nothings	noth
notice	notic
notify	notifi
noting	note
notion	notion
notorious	notori
notoriously	notori
notre	notr
notwithstanding	notwithstand
nought	nought
noun	noun
nouns	noun
nourish	nourish
nourished	nourish
nourisher	nourish
nourishes	nourish
nourisheth	nourisheth
nourishing	nourish
nourishment	nourish
nous	nou
novel	novel
novelties	novelti
novelty	novelti
noverbs	
	noverb
novi	novi
novice	novic
novices	novic
novum	novum
now	now
nowhere	nowher

noyance	noyanc
ns	ns
nt	nt
nubibus	nubibu
numa	numa
numb	numb
number	number
numbered	number
numbering	number
numberless	numberless
numbers	number
numbness	numb
nun	nun
nuncio	nuncio
nuncle	nuncl
nunnery	nunneri
nuns	nun
nuntius	nuntiu
nuptial	nuptial
nurs	nur
nurse	nurs
nursed	nurs
nurser	nurser
nursery	nurseri
nurses	nurs
nurseth	
nurseth	
nursh	nursh
nursing	nurs
nurtur	nurtur
nurture	nurtur
nut	nut
nuthook	nuthook
nutmeg	nutmeg
nutmegs	nutmeg
nutriment	nutriment
nuts	nut
nutshell	nutshel
ny	ny
nym	nym
nymph	nymph
nymphs	nymph
o	o
oak	oak
oaken	oaken
oaks	oak
oared	oar
oars	oar

oatcake	oatcak
oaten	oaten
oath	oath
oathable	oathabl
oaths	oath
oats	oat
ob	ob
obduracy	obduraci
obdurate	obdur
obedience	obedi
obedient	obedi
obeisance	obeis
oberon	oberon
obey	obei
obeyed	obei
obeying	obei
obeys	obei
obidicut	obidicut
object	object
objected	object
objections	object
objects	object
oblation	oblat
oblations	oblat
obligation	oblig
obligations	oblig
obliged	oblig
oblique	obliqu
oblivion	oblivion
oblivious	oblivi
obloquy	obloqui
obscene	obscen
obscenely	obscen
obscur	obscur
obscure	obscur
obscurd	obscur
obscurely	obscur
obscurities	obscur
obscuring	obscur
obscurity	obscur
obsequies	obsequi
obsequious	obsequi
obsequiously	
obsequi	
observe	observ
observance	observ
observances	observ

observancy	observ
observant	observ
observants	observ
observation	observ
observe	observ
observed	observ
observer	observ
observers	observ
observing	observ
observingly	observingly
obsque	obsqu
obstacle	obstacl
obstacles	obstacl
obstinacy	obstinaci
obstinate	obstin
obstinately	obstin
obstruct	obstruct
obstruction	obstruct
obstructions	obstruct
obtain	obtain
obtained	obtain
obtaining	obtain
occasion	occas
occasions	occas
occident	occid
occidental	occident
occulted	occult
occupat	
occupat	
occupation	occup
occupations	occup
occupied	occupi
occupies	occupi
occupy	occupi
occurrence	occurr
occurrences	occurr
occurents	occurr
ocean	ocean
oceans	ocean
octavia	octavia
octavius	octaviu
ocular	ocular
od	od
odd	odd
oddest	oddest
oddly	oddli
odds	odd
ode	od

odes	od
odious	odiou
odoriferous	odorifer
odorous	odor
odour	odour
odours	odour
ods	od
oeillades	oeillad
oes	oe
oeuvres	oeuvr
of	of
ofephesus	ofephesu
off	
off	
offal	offal
offence	offenc
offenceful	offenc
offences	offenc
offend	offend
offended	offend
offendendo	offendendo
offender	offend
offenders	offend
offendeth	offendeth
offending	offend
offendress	offendress
offends	offend
offense	offens
offenseless	offenseless
offenses	offens
offensive	offens
offer	offer
offered	offer
offering	offer
offerings	offer
offers	offer
offert	offert
offic	offic
office	offic
officed	offic
officer	offic
officers	offic
offices	offic
official	offici
officious	offici
offspring	offspr
oft	oft
often	often

oftener	often
oftentimes	oftentim
oh	oh
oil	oil
oils	oil
oily	oili
old	old
oldcastle	oldcastl
olden	olden
older	older
oldest	oldest
oldness	old
olive	oliv
oliver	oliv
olivers	oliv
olives	oliv
olivia	olivia
olympian	olympian
olympus	olympu
oman	oman
omans	oman
omen	omen
ominous	omin
omission	omiss
omit	omit
omittance	omitt
omitted	omit
omitting	omit
omne	omn
omnes	
omn	
omnipotent	omnipot
on	on
once	onc
one	on
ones	on
oneyers	oney
ongles	ongl
onion	onion
onions	onion
only	onli
onset	onset
onward	onward
onwards	onward
oo	oo
ooze	ooz
oozes	ooz
oozy	oozi

op	op
opal	opal
ope	op
open	open
opener	open
opening	open
openly	openli
openness	open
opens	open
operant	oper
operate	oper
operation	oper
operations	oper
operative	oper
opes	op
oph	oph
ophelia	ophelia
opinion	opinion
opinions	opinion
opportune	opportun
opportunities	opportun
opportunity	opportun
oppos	oppo
oppose	oppos
opposed	oppos
opposeless	opposeless
opposer	oppos
opposers	oppos
opposes	oppos
opposing	oppos
opposite	opposit
opposites	opposit
opposition	opposit
oppositions	opposit
oppress	oppress
oppressed	oppress
oppresses	oppress
oppresseth	oppresseth
oppressing	oppress
oppression	oppress
oppressor	oppressor
opprest	opprest
opprobriously	opprobri
oppugnancy	oppugn
opulency	opul
opulent	opul
or	

or	
oracle	oracl
oracles	oracl
orange	orang
oration	orat
orator	orat
orators	orat
oratory	oratori
orb	orb
orbed	orb
orbs	orb
orchard	orchard
orchards	orchard
ord	ord
ordain	ordain
ordained	ordain
ordaining	ordain
order	order
ordered	order
ordering	order
orderless	orderless
orderly	orderli
orders	order
ordinance	ordin
ordinant	ordin
ordinaries	ordinari
ordinary	ordinari
ordnance	ordnanc
ords	ord
ordure	ordur
ore	or
organ	organ
organs	organ
orgillous	orgil
orient	orient
orifex	orifex
origin	origin
original	origin
orisons	orison
ork	ork
orlando	orlando
orld	orld
orleans	orlean
ornament	ornament
ornaments	ornament
orodes	orod
orphan	orphan
orphans	orphan

orpheus	orpheu
orsino	orsino
ort	ort
orthography	orthographi
orts	ort
oscorbidulchos	oscorbidulcho
osier	osier
osiers	osier
osprey	osprei
osr	osr
osric	osric
ossa	ossa
ost	ost
ostent	ostent
ostentare	ostentar
ostentation	ostent
ostents	
	ostent
ostler	ostler
ostlers	ostler
ostrich	ostrich
osw	osw
oswald	oswald
othello	othello
other	other
othergates	otherg
others	other
otherwhere	otherwher
otherwhiles	otherwhil
otherwise	otherwis
otter	otter
ottoman	ottoman
ottomites	ottomit
oublie	oubli
ouches	ouch
ought	ought
oui	oui
ounce	ounc
ounces	ounc
ouphes	ouph
our	our
ours	our
ourself	ourself
ourselves	ourself
ousel	ousel
out	out
outbids	outbid
outbrave	outbrav

outbraves	outbrav
outbreak	outbreak
outcast	outcast
outcries	outcri
outcry	outcri
outdar	outdar
outdare	outdar
outdares	outdar
outdone	outdon
outfac	outfac
outface	outfac
outfaced	outfac
outfacing	outfac
outfly	outfli
outfrown	outfrown
outgo	outgo
outgoes	outgo
outgrown	outgrown
outjest	outjest
outlaw	outlaw
outlawry	outlawri
outlaws	outlaw
outliv	outliv
outlive	outliv
outlives	outliv
outliving	outliv
outlook	outlook
outlustres	outlustr
outpriz	outpriz
outrage	outrag
outrageous	outrag
outrages	outrag
outran	outran
outright	outright
outroar	outroar
outrun	outrun
outrunning	outrun
outruns	outrun
outscold	outscold
outscorn	outscorn
outsell	outsel
outsells	outsel
outside	outsid
outsides	outsid
outspeaks	outspeak
outsport	outsport
outstare	outstar
outstay	outstai

outstood	outstood
outstretch	outstretch
outstretched	outstretch
outstrike	outstrik
outstrip	outstrip
outstripped	outstrip
outswear	outswear
outvenoms	outvenom
outward	outward
outwardly	outwardli
outwards	outward
outwear	outwear
outweighs	outweigh
outwent	outwent
outworn	outworn
outworths	outworth
oven	oven
over	over
overawe	overaw
overbear	overbear
overblown	overblown
overboard	overboard
overbold	overbold
overborne	overborn
overbulk	overbulk
overbuys	overbui
overcame	overcam
overcast	overcast
overcharg	overcharg
overcharged	overcharg
overcome	overcom
overcomes	overcom
overdone	overdon
overearnest	overearnest
overfar	overfar
overflow	overflow
overflown	overflown
overglance	overgl
overgo	overgo
overgone	overgon
overgorg	overgorg
overgrown	overgrown
overhead	overhead
overhear	
overhear	
overheard	overheard
overhold	overhold
overjoyed	overjoi

overkind	overkind
overland	overland
overleather	overleath
overlive	overl
overlook	overlook
overlooking	overlook
overlooks	overlook
overmaster	overmast
overmounting	overmount
overmuch	overmuch
overpass	overpass
overpeer	overp
overpeering	overp
overplus	overplu
overrul	overrul
overrun	overrun
overscutch	overscutch
overset	overset
overshades	overshad
overshine	overshin
overshines	overshin
overshot	overshot
oversights	oversight
overspread	overspread
overstain	overstain
over swear	over swear
overt	
overt	
overta	overta
overtake	overtak
overtaketh	overtaketh
overthrow	overthrow
overthrown	overthrown
overthrows	overthrow
overtook	overtook
overtopp	overtopp
overture	overtur
overturn	overturn
overwatch	overwatch
overween	overween
overweening	overween
overweigh	overweigh
overwhelm	overwhelm
overwhelming	overwhelm
overworn	overworn
ovid	ovid
ovidius	ovidiu
ow	ow

owe	ow
owed	ow
owedst	owedst
owen	owen
owes	ow
owest	owest
oweth	oweth
owing	ow
owl	owl
owls	owl
own	
	own
owner	owner
owners	owner
owning	own
owns	own
owy	owi
ox	ox
oxen	oxen
oxford	oxford
oxfordshire	oxfordshir
oxlips	oxlip
oyes	oy
oyster	oyster
p	p
pabble	pabbl
pabylon	pabylon
pac	pac
pace	pace
paced	pace
paces	pace
pacified	pacifi
pacify	pacifi
pacing	pace
pack	pack
packet	packet
packets	packet
packhorses	packhors
packing	pack
packings	pack
packs	pack
packthread	packthread
pacorus	pacoru
paction	
	paction
pad	pad
paddle	paddl
paddling	paddl

paddock	paddock
padua	padua
pagan	pagan
pagans	pagan
page	page
pageant	pageant
pageants	pageant
pages	page
pah	pah
paid	paid
pail	pail
pailfuls	pail
pails	pail
pain	pain
pained	pain
painful	pain
painfully	painfulli
pains	pain
paint	paint
painted	paint
painter	painter
painting	paint
paintings	paint
paints	paint
pair	pair
paired	pair
pairs	pair
pajock	pajock
pal	pal

palabras	palabra
palace	palac
palaces	palac
palamedes	palamed
palate	palat
palates	palat
palatine	palatin
palating	palat
pale	pale
paled	pale
paleness	pale
paler	paler
pales	pale
palestine	palestin
palfrey	palfrei
palfreys	palfrei
palisadoes	palisado
pall	pall

pallabris	pallabri
pallas	palla
pallets	pallet
palm	palm
palmer	palmer
palmer's	palmer
palms	palm
palmy	palmi
palpable	palpabl
palsied	palsi
palsies	palsi
palsy	palsi
palt	palt
palter	
palter	
paltry	paltri
paly	pali
pamp	pamp
pamper	pamper
pamphlets	pamphlet
pan	pan
pancakes	pancack
pancake	pancak
pancakes	pancak
pandar	pandar
pandars	pandar
pandarus	pandaru
pander	pander
panderly	panderli
panders	pander
pandulph	pandulph
panel	panel
pang	pang
panging	pang
pangs	pang
pannier	pannier
pannonians	pannonian
pansa	pansa
pansies	pansi
pant	pant
pantaloons	pantaloons
panted	pant
pantheon	pantheon
panther	panther
panthino	panthino
panting	pant

pantingly	pantingli
pantler	pantler
pantry	pantri
pants	pant
pap	pap
papal	papal
paper	paper
papers	paper
paphlagonia	paphlagonia
paphos	papho
papist	papist
paps	pap
par	par
parable	parabl
paracelsus	paracelsu
paradise	paradis
paradox	paradox
paradoxes	paradox
paragon	paragon
paragons	paragon
parallel	parallel
parallels	parallel
paramour	paramour
paramours	paramour
parapets	parapet
paraquito	paraquito
parasite	parasit
parasites	parasit
parca	parca
parcel	parcel
parcell	parcel
parcels	parcel
parch	parch
parched	parch
parching	parch
parchment	parchment
pard	pard
pardon	pardon
pardona	pardona
pardoned	pardon
pardoner	pardon
pardoning	pardon
pardonne	pardonn
pardonner	pardonn
pardonnez	pardonnez
pardons	pardon
pare	pare
pared	pare

parel	parel
parent	parent
parentage	parentag
parents	parent
parfect	parfect
paring	pare
parings	pare
paris	pari
parish	parish
parishioners	parishion
parisians	parisian
paritors	paritor
park	park
parks	park
parle	
	parl
parler	parler
parles	parl
parley	parlei
parlez	parlez
parliament	parliament
parlors	parlor
parlour	parlour
parlous	parlou
parmacity	parmac
parolles	parol
parricide	parricid
parricides	parricid
parrot	parrot
parrots	parrot
parsley	parslei
parson	parson
part	part
partake	partak
partaken	partaken
partaker	partak
partakers	partak
parted	part
parthia	parthia
parthian	parthian
parthians	parthian
parti	parti
partial	partial
partialize	partial
partially	partial
participate	particip

participation	particip
particle	particl
particular	particular
particularities	particular
particularize	particular
particularly	particularli
particulars	particular
parties	parti
parting	part
partisan	partisan
partisans	partisan
partition	partit
partizan	partizan
partlet	partlet
partly	partli
partner	partner
partners	partner
partridge	partridg
parts	part
party	parti
pas	pa
pash	pash
pashed	pash
pashful	pash
pass	pass
passable	passabl
passado	passado
passage	passag
passages	passag
passant	passant
passed	
pass	
passenger	passeng
passengers	passeng
passes	pass
passeth	passeth
passing	pass
passio	passio
passion	passion
passionate	passion
passioning	passion
passions	passion
passive	passiv
passport	passport
passy	passi
past	past
paste	past
pasterns	pastern

pasties	pasti
pastime	pastim
pastimes	pastim
pastoral	pastor
pastorals	pastor
pastors	pastor
pastry	pastri
pasture	pastur
pastures	pastur
pasty	pasti
pat	pat
patay	patai
patch	patch
patchery	patcheri
patches	patch

pate	pate
pated	pate
patent	patent
patents	patent
paternal	patern
pates	pate
path	path
pathetical	pathet
paths	path
pathway	pathwai
pathways	pathwai
patience	patienc
patient	patient
patiently	patient
patients	patient
patines	patin
patrician	patrician
patricians	patrician
patrick	patrick
patrimony	patrimoni
patroclus	patroclu
patron	patron
patronage	patronag
patroness	patro
patrons	patron
patrum	patrum
patter	patter
pattern	pattern
patterns	pattern
pattle	pattl
pauca	pauca

paucas	pauca
paul	paul
paulina	paulina
paunch	paunch
paunches	paunch
pause	paus
pauser	pauser
pauses	paus
pausingly	pausingli
pauvres	pauvr
pav	pav
paved	pave
pavement	pavement
pavilion	pavilion
pavilions	pavilion
pavin	pavin
paw	paw
pawn	pawn
pawns	pawn
paws	paw
pax	pax
pay	pai
payest	payest
paying	pai
payment	payment
payments	payment
pays	pai
paysan	paysan
paysans	paysan
pe	pe
peace	peac
peaceable	peaceabl
peaceably	
peaceabl	
peaceful	peac
peacemakers	peacemak
peaces	peac
peach	peach
peaches	peach
peacock	peacock
peacocks	peacock
peak	peak
peaking	peak
peal	peal
peals	peal
pear	pear
peard	peard
pearl	pearl

pearls	pearl
pears	pear
peas	pea
peasant	peasant
peasantry	peasantri
peasants	peasant
peascod	peascod
pease	peas
peaseblossom	peaseblossom
peat	peat
peaten	peaten
peating	peat
pebble	pebbl
pebbled	pebbl
pebbles	pebbl
peck	peck
pecks	peck
peculiar	peculiar
pecus	pecu
pedant	pedant
pedantical	pedant
pedascul	pedascul
pede	pede
pedestal	pedest
pedigree	pedigre
pedlar	pedlar
pedlars	pedlar
pedro	pedro
peds	ped
peel	peel
peep	peep
peeped	peep
peeping	peep
peeps	peep
peer	peer
peereth	peereth
peering	peer
peerless	peerless
peers	peer
peesel	peesel
peevish	peevish
peevishly	peevishli
peflur	peflur
peg	peg
pegasus	pegasu
pegs	peg
peise	peis

peised	peis
peize	peiz
pelf	pelf
pelican	pelican
pelion	pelion
pell	pell
pella	pella
pelleted	pellet
peloponnesus	peloponnesu
pelt	pelt
pelting	pelt
pembroke	pembrok
pen	pen
penalties	penalti
penalty	penalti
penance	penanc
pence	penc
pencil	pencil
pencill	pencil
pencils	pencil
pendant	pendant
pendent	pendent
pendragon	pendragon
pendulous	pendul
penelope	penelop
penetrable	penetr
penetrate	penetr
penetrative	penetr
penitence	penit
penitent	penit
penitential	penitenti
penitently	penit
penitents	penit
penker	
	penker
penknife	penknif
penn	penn
penned	pen
penning	pen
pennons	pennon
penny	penni
pennyworth	pennyworth
pennyworths	pennyworth
pens	pen
pense	pens
pension	pension
pensioners	pension

pensive	pensiv
pensived	pensiv
pensively	pensiv
pent	pent
pentecost	pentecost
penthesilea	penthesilea
penthouse	penthous
penurious	penuri
penury	penuri
peopl	peopl
people	peopl
peopled	peopl
peoples	peopl
pepin	pepin
pepper	pepper
peppercorn	peppercorn
peppered	pepper
per	per
peradventure	
peradventur	
peradventures	peradventur
perceiv	perceiv
perceive	perceiv
perceived	perceiv
perceives	perceiv
perceiveth	perceiveth
perch	perch
perchance	perchanc
percies	perci
percussion	percuss
percy	perci
perdie	perdi
perdita	perdita
perdition	perdit
perdonato	perdonato
perdu	perdu
perdurable	perdur
perdurably	perdur
perdy	perdi
pere	pere
peregrinate	peregrin
peremptorily	peremptorili
peremptory	peremptori
perfect	perfect
perfected	perfect
perfecter	perfect
perfectest	perfectest
perfection	perfect

perfections	perfect
perfectly	
perfectli	
perfectness	perfect
perfidious	perfidi
perfidiously	perfidi
perforce	perforc
perform	perform
performance	perform
performances	perform
performed	perform
performer	perform
performers	perform
performing	perform
performs	perform
perfum	perfum
perfume	perfum
perfumed	perfum
perfumer	perfum
perfumes	perfum
perge	perg
perhaps	perhap
periapts	periapt
perigort	perigort
perigouna	perigouna
peril	peril
perilous	peril
perils	peril
period	period
periods	period
perish	perish
perished	perish
perishest	perishest
perisheth	
perisheth	
perishing	perish
periwig	periwig
perjur	perjur
perjure	perjur
perjured	perjur
perjuries	perjuri
perjury	perjuri
perk	perk
perkes	perk
permafoy	permafoi
permanent	perman
permission	permiss
permissive	permiss

permit	permit
permitted	permit
pernicious	pernici
perniciously	pernici
peroration	peror
perpend	perpend
perpendicular	perpendicular
perpendicularly	perpendiculari
perpetual	perpetu
perpetually	perpetu
perpetuity	perpetu
perplex	perplex
perplexed	perplex
perplexity	perplex
pers	per
persecuted	persecut
persecutions	
persecut	
persecutor	persecutor
perseus	perseu
persever	persev
perseverance	persever
persevers	persev
persia	persia
persian	persian
persist	persist
persisted	persist
persistence	persist
persistive	persist
persists	persist
person	person
personae	persona
personage	personag
personages	personag
personal	person
personally	person
personate	person
personated	person
personates	person
personating	person
persons	person
perspective	perspect
perspectively	perspect
perspectives	perspect
perspicuous	perspicu
persuade	persuad
persuaded	persuad
persuades	persuad

persuading	persuad
persuasion	persuas
persuasions	persuas
pert	pert
pertain	pertain
pertaining	pertain
pertains	pertain
pertaunt	pertaunt
pertinent	pertin
pertly	pertli
perturb	perturb
perturbation	perturb
perturbations	perturb
perturbed	perturb
perus	peru
perusal	perus
peruse	perus
perused	perus
perusing	perus
perverse	pervers
perversely	pervers
perverseness	pervers
pervert	pervert
perverted	pervert
peseech	peseech
pest	pest
pester	pester
pestiferous	pestifer
pestilence	pestil
pestilent	pestil
pet	pet
petar	petar
peter	peter
petit	petit
petition	petit
petitionary	petitionari
petitioner	petition
petitioners	petition
petitions	petit
peto	peto
petrarch	petrarch
petruchio	petruchio
petter	petter
petticoat	petticoat
petticoats	petticoat
pettiness	petti
pettish	pettish
pettitoes	pettito

petty	petti
peu	peu
pew	pew
pewter	pewter
pewterer	pewter
phaethon	phaethon
phaeton	phaeton
phantasime	phantasim
phantasimes	phantasim
phantasma	phantasma
pharamond	pharamond
pharaoh	pharaoh
pharsalia	pharsalia
pheasant	
pheasant	
pheazar	pheazar
phebe	phebe
phebes	phebe
pheebus	pheebu
pheeze	pheez
phibbus	phibbu
philadelphos	philadelpho
philario	philario
philarmonus	philarmonu
philemon	philemon
philip	philip
philippan	philippan
philippe	philipp
philippi	philippi
phillida	phillida
philo	philo
philomel	philomel
philomela	philomela
philosopher	philosoph
philosophers	philosoph
philosophical	philosoph
philosophy	philosophi
philostrate	philostr
philotus	philotu
phlegmatic	phlegmat
phoebe	phoeb
phoebus	phoebu
phoenicia	phoenicia
phoenicians	phoenician
phoenix	phoenix
phorbus	phorbu
photinus	photinu

phrase	phrase
phraseless	phraseless
phrases	phrase
phrygia	phrygia
phrygian	phrygian
phrynia	phrynia
physic	physic
physical	physic
physician	physician
physicians	physician
physics	physic
pia	pia
pibble	pibbl
pible	pibl
picardy	picardi
pick	pick
pickaxe	pickax
pickaxes	pickax
pickbone	pickbon
picked	pick
pickers	picker
picking	pick
pickle	pickl
picklock	picklock
pickpurse	pickpurs
picks	pick
pickt	pickt
pickthanks	pickthank

pictur	pictur
picture	pictur
pictured	pictur
pictures	pictur
pid	pid
pie	pie
piec	piec
piece	piec
pieces	piec
piecing	piec
pied	pi
piedness	pied
pier	pier
pierc	pierc
ierce	pierc
pierced	pierc
pierces	pierc
pierceth	pierceth
piercing	pierc

piercy	pierci
piers	pier
pies	pi
piety	pieti
pig	pig
pigeon	pigeon
pigeons	pigeon
pight	pight
pigmy	pigmi
pigrogromitus	pigrogromitu
pike	pike
pikes	pike
pil	pil
pilate	
pilat	
pilates	pilat
pilchers	pilcher
pile	pile
piles	pile
pilf	pilf
pilfering	pilfer
pilgrim	pilgrim
pilgrimage	pilgrimag
pilgrims	pilgrim
pill	pill
pillage	pillag
pillagers	pillag
pillar	pillar
pillars	pillar
pillicock	pillicock
pillory	pillori
pillow	pillow
pillows	pillow
-pills	pill
pilot	pilot
pilots	pilot
pimpernell	pimpernel
pin	pin
pinch	pinch
pinched	pinch
pinches	pinch
pinching	pinch
pindarus	pindaru
pine	pine
pined	pine
pinet	pine
pinfold	

pinfold

pinning	pine
pinion	pinion
pink	pink
pinn	pinn
pinnace	pinnac
pins	pin
pinse	pins
pint	pint
pintpot	pintpot
pioned	pion
pioneers	pioneer
pioner	pioner
pioners	pioner
pious	piou
pip	pip
pipe	pipe
piper	piper
pipers	piper
pipes	pipe
piping	pipe
pippin	pippin
pippins	pippin
pirate	pirat
pirates	pirat
pisa	pisa
pisanio	pisanio
pish	pish
pismires	pismir
piss	piss
pissing	piss
pistol	pistol
pistols	

pistol

pit	pit
pitch	pitch
pitched	pitch
pitcher	pitcher
pitchers	pitcher
pitchy	pitchi
piteous	piteou
piteously	piteous
pitfall	pitfal
pith	pith
pithless	pithless
pithy	pithi
pitie	piti
pitied	piti

pities	piti
pitiful	piti
pitifully	pitifulli
pitiless	pitiless
pits	pit
pittance	pittanc
pittie	pitti
pittikins	pittikin
pity	piti
pitying	piti
pius	piu
plac	plac
place	place
placed	place
placentio	placentio
places	place
placeth	placeth
placid	
placid	
placing	place
plack	plack
placket	placket
plackets	placket
plagu	plagu
plague	plagu
plagued	plagu
plagues	plagu
plaguing	plagu
plaguy	plagui
plain	plain
plainer	plainer
plainest	plainest
plaining	plain
plainings	plain
plainly	plainli
plainness	plain
plains	plain
plainsong	plainsong
plaintful	plaint
plaintiff	plaintiff
plaintiffs	plaintiff
plaints	plaint
planned	planch
planet	planet
planetary	planetari
planets	planet
planks	plank
plant	plant

plantage	plantag
plantagenet	
plantagenet	
plantagenets	plantagenet
plantain	plantain
plantation	plantat
planted	plant
planteth	planteth
plants	plant
plash	plash
plashy	plashi
plast	plast
plaster	plaster
plasterer	plaster
plat	plat
plate	plate
plated	plate
plates	plate
platform	platform
platforms	platform
plats	plat
platted	plat
plausible	plausibl
plausive	plausiv
plautus	plautu
play	plai
played	plai
player	player
players	player
playeth	playeth
playfellow	playfellow
playfellows	playfellow
playhouse	playhous
playing	plai
plays	plai
plea	plea
pleach	pleach
pleached	pleach
plead	plead
pleaded	plead
pleader	pleader
pleaders	pleader
pleading	plead
pleads	plead
pleas	plea
pleasance	pleasanc
pleasant	pleasant
pleasantly	pleasantli

please	pleas
pleased	pleas
pleaser	pleaser
pleasers	pleaser
pleases	pleas
pleasest	pleasest
pleaseth	pleaseth
pleasing	pleas
pleasure	pleasur
pleasures	pleasur
plebeians	plebeian
plebeii	plebeii
plebs	pleb
pledge	pledg
pledges	pledg
pleines	plein
plenitude	
plenitud	
plenteous	plenteou
plenteously	plenteous
plenties	plenti
plentiful	plenti
plentifully	plentifulli
plenty	plenti
pless	pless
plessed	pless
plessing	pless
pliant	pliant
plied	pli
plies	pli
plight	plight
plighted	plight
plighter	plighter
plod	plod
plodded	plod
plodders	plodder
plodding	plod
plods	plod
plood	plood
ploody	ploodi
plot	plot
plots	plot
plotted	plot
plotter	plotter
plough	plough
ploughed	plough
ploughman	ploughman
ploughmen	ploughmen

plow	
plow	
plows	plow
pluck	pluck
plucked	pluck
plucker	plucker
plucking	pluck
plucks	pluck
plue	plue
plum	plum
plume	plume
plumed	plume
plumes	plume
plummet	plummet
plump	plump
plumpy	plumpi
plums	plum
plung	plung
plunge	plung
plunged	plung
plural	plural
plurisy	plurisi
plus	plu
pluto	pluto
plutus	plutu
ply	ply
po	po
pocket	pocket
pocketing	pocket
pockets	pocket
pocky	pocki
pody	podi
poem	poem
poesy	poesi
poet	poet
poetical	poetic
poetry	poetri
poets	poet
poictiers	poictier
poinards	poinard
poins	poin
point	point
pointblank	pointblank
pointed	point
pointing	point
points	point
pois	poi
poise	pois

poising	pois
poison	poison
poisoned	poison
poisoner	poison
poisoning	poison
poisonous	poison
poisons	poison
poke	poke
poking	poke
pol	pol
polack	polack
polacks	polack
poland	poland
pold	pold
pole	pole
poleaxe	poleax
polecat	polecat
polecats	polecat
polemon	polemon
poles	pole
poli	poli
policies	polic
policy	polic
polish	polish
polished	polish
politic	polit
politician	politician
politicians	politician
politicly	politicli
polixenes	polixen
poll	poll
polluted	pollut
pollution	pollut
polonius	poloniu
poltroons	poltroon
polusion	polus
polydamus	polydamu
polydore	polydor
polyxena	polyxena
pomander	pomand
pomegranate	pomegran
pomewater	pomewat
pomfret	pomfret
pomgarnet	pomgarnet
pommel	pommel
pomp	pomp
pompeius	pompeiu
pompey	pompei

pompion	
pompion	
pompous	pompou
pomps	pomp
pond	pond
ponder	ponder
ponderous	ponder
ponds	pond
poniard	poniard
poniards	poniard
pont	pont
pontic	pontic
pontifical	pontif
ponton	ponton
pooh	pooh
pool	pool
poole	pool
poop	poop
poor	poor
poorer	poorer
poorest	poorest
poorly	poorli
pop	pop
pope	pope
popedom	popedom
popilius	popiliu
popingay	popingai
popish	popish
popp	popp
poppy	poppi
pops	pop
popular	popular
popularity	popular
populous	
popul	
porch	porch
porches	porch
pore	pore
poring	pore
pork	pork
porn	porn
porpentine	porpentin
porridge	porridg
porringer	porring
port	port
portable	portabl
portage	portag
portal	portal

portance	portanc
portcullis	portculli
portend	portend
portends	portend
portent	portent
portentous	portent
portents	portent
porter	porter
porters	porter
portia	portia
portion	portion
portly	portli
portotartarossa	portotartarossa
portrait	portrait
portraiture	portraiture
ports	port
portugal	portug
pose	pose
posied	posi
posies	posi
position	posit
positive	posit
positively	posit
posse	poss
possess	possess
possessed	possess
possesses	possess
possesseth	possesseth
possessing	possess
possession	possess
possessions	possess
possessor	possessor
posset	posset
possets	posset
possibilities	possibl
possibility	possibl
possible	possibl
possibly	possibl
possitable	possit
post	post
poste	post
posted	post
posterior	posterior
posteriors	posterior
posterity	poster
postern	postern
posterns	postern
posters	poster

posthorse	posthors
posthorses	posthors
posthumus	posthumu
posting	post
postmaster	postmast
posts	post
postscript	postscript
posture	postur
postures	postur
posy	posi
pot	pot
potable	potabl
potations	potat
potato	potato
potatoes	potato
potch	potch
potency	potenc
potent	potent
potentates	potent
potential	potenti
potently	potent
potents	potent
pothecary	pothecari
pother	pother
potion	potion
potions	potion
potpan	potpan
pots	pot
potter	potter
potting	pot
pottle	pottl
pouch	
	pouch
poulter	poulter
poultice	poultic
poultney	poultnei
pouncet	pouncet
pound	pound
pounds	pound
pour	pour
pourest	pourest
pouring	pour
pourquoi	pourquoi
pours	pour
pout	pout
poverty	poverti
pow	pow
powd	powd

powder	powder
power	power
powerful	power
powerfully	powerfulli
powerless	powerless
powers	power
pox	pox
poys	poi
poysam	poysam
prabbles	prabbl
practic	practic
practice	practic
practiced	practic
practicer	practic
practices	practic
practicing	
practic	
practis	practi
practisants	practis
practise	practis
practiser	practis
practisers	practis
practises	practis
practising	practis
praeclarissimus	praeclarissimu
praemunire	praemunir
praetor	praetor
praetors	praetor
pragging	prag
prague	pragu
prain	prain
prains	prain
prais	prai
praise	prais
praised	prais
praises	prais
praisest	praisest
praiseworthy	praiseworthy
praising	prais
prancing	pranc
prank	prank
pranks	prank
prat	prat
prate	prate
prated	prate
prater	prater
prating	prate
prattle	

prattl	
prattler	prattler
prattling	prattl
prave	prave
prawls	prawl
prawns	prawn
pray	prai
prayer	prayer
prayers	prayer
praying	prai
prays	prai
pre	pre
preach	preach
preached	preach
preachers	preacher
preaches	preach
preaching	preach
preachment	preachment
pread	pread
preambulate	preambul
precedence	preced
precedent	preced
preceding	preced
precept	precept
preceptial	precepti
precepts	precept
precinct	precinct
precious	preciou
preciously	precious
precipice	precipic
precipitating	precipit
precipitation	
precipit	
precise	precis
precisely	precis
preciseness	precis
precisian	precisian
precor	precor
precurse	precurs
precursors	precursor
predeceased	predeceas
predecessor	predecessor
predecessors	predecessor
predestinate	predestin
predicament	predica
predict	predict
prediction	predict
predictions	predict

predominance	predomin
predominant	predomin
predominate	predomin
preeches	preech
preeminence	preemin
preface	prefac
prefer	prefer
preferment	prefer
preferments	prefer
preferr	preferr
preferreth	preferreth
preferring	prefer
prefers	prefer
prefiguring	prefigur
prefix	
prefix	
prefixed	prefix
performed	perform
pregnancy	pregnanc
pregnant	pregnant
pregnantly	pregnantli
prejudicates	prejud
prejudice	prejudic
prejudicial	prejudici
prelate	prelat
premeditated	premedit
premeditation	premedit
premised	premis
premises	premis
prenez	prenez
prenominate	prenomin
prentice	prentic
prentices	prentic
preordinance	preordin
prepar	prepar
preparation	prepar
preparations	prepar
prepare	prepar
prepared	prepar
preparedly	preparedli
prepares	prepar
preparing	prepar
prepost	prepost
preposterous	preposter
preposterously	preposter
prerogatifes	
prerogatif	
prerogative	prerog

prerogated	prerogativ
presage	presag
presagers	presag
presages	presag
presageth	presageth
presaging	presag
prescience	prescienc
prescribe	prescrib
prescript	prescript
prescription	prescript
prescriptions	prescript
prescripts	prescript
presence	presenc
presences	presenc
present	present
presentation	present
presented	present
presenter	present
presenters	present
presenteth	presenteth
presenting	present
presently	present
presentment	present
presents	present
preserv	preserv
preservation	preserv
preservative	preserv
preserve	preserv
preserved	
preserv	
preserver	preserv
preservers	preserv
preserving	preserv
president	presid
press	press
pressed	press
presser	presser
presses	press
pressing	press
pressure	pressur
pressures	pressur
prest	prest
prester	prester
presume	presum
presumes	presum
presuming	presum
presumption	presumpt
presumptuous	presumptu

presuppos	presuppo
pret	pret
pretence	pretenc
pretences	pretenc
pretend	pretend
pretended	pretend
pretending	pretend
pretense	pretens
pretext	pretext
pretia	pretia
prettier	prettier
prettiest	prettiest

prettily	prettili
prettiness	pretti
pretty	pretti
prevail	prevail
prevailed	prevail
prevaieth	prevaieth
prevailing	prevail
prevailment	prevail
prevails	prevail
prevent	prevent
prevented	prevent
prevention	prevent
preventions	prevent
prevents	prevent
prey	prei
preyful	prey
preys	prei
priam	priam
priami	priami
priamus	priamu
pribbles	pribbl
price	price
prick	prick
pricked	prick
pricket	pricket
pricking	prick
pricks	prick
pricksong	pricksong
pride	pride
prides	pride
pridge	pridg
prie	
	prie
pried	pri
prief	prief

pries	pri
priest	priest
priesthood	priesthood
priests	priest
prig	prig
primal	primal
prime	prime
primer	primer
primero	primero
primest	primest
primitive	primit
primo	primo
primogenity	primogen
primrose	primros
primroses	primros
primy	primi
prince	princ
princely	princ
princes	princ
princess	princess
principal	princip
principalities	princip
principality	princip
principle	principl
principles	principl
princox	princox
prings	pring
print	print
printed	
print	
printing	print
printless	printless
prints	print
prioress	prioress
priories	priori
priority	prioriti
priory	priori
priscian	priscian
prison	prison
prisoner	prison
prisoners	prison
prisonment	prison
prisonnier	prisonni
prisons	prison
pristine	pristin
prithe	prith
prithee	prithe
privacy	privaci

private	privat
privately	privat
privates	privat
privilage	privilag
privileg	privileg
privilege	privileg
privileged	privileg
privileges	privileg
privilegio	privilegio
privily	privili
privity	priviti
privy	privi
priz	priz
prize	prize
prized	prize
prizer	prizer
prizes	prize
prizest	prizest
prizing	prize
pro	pro
probable	probabl
probal	probal
probation	probat
proceed	proce
proceeded	proceed
proceeders	proceed
proceeding	proceed
proceedings	proceed
proceeds	proce
process	process
procession	process
proclaim	proclaim
proclaimed	proclaim
proclaimeth	proclaimeth
proclaims	proclaim
proclamation	proclam
proclamations	proclam
proconsul	proconsul
procrastinate	procrastin
procreant	procreant
procreants	procreant
procreation	procreat
procrus	
procru	
proculeius	proculeiu
procur	procur
procurator	procur
procure	procur

procured	procur
procures	procur
procuring	procur
prodigal	prodig
prodigality	prodig
prodigally	prodig
prodigals	prodig
prodigies	prodigi
prodigious	prodigi
prodigiously	prodigi
prodigy	prodigi
proditor	proditor
produc	produc
produce	produc
produced	produc
produces	produc
producing	produc
proface	profac
profan	profan
profanation	profan
profane	profan
profaned	profan
profanely	profan
profaneness	profan
profaners	profan
profaning	profan
profess	
profess	
professed	profess
professes	profess
profession	profess
professions	profess
professors	professor
proffer	proffer
proffered	proffer
profferer	proffer
proffers	proffer
proficient	profici
profit	profit
profitable	profit
profitably	profit
profited	profit
profiting	profit
profitless	profitless
profits	profit
profound	profound
profoundest	profoundest
profoundly	profoundli

progenitors	progenitor
progeny	progeni
progne	progn
prognosticate	prognost
prognostication	prognost
progress	progress
progression	progress
prohibit	prohibit
prohibition	prohibit
project	
project	
projection	project
projects	project
prolixious	prolixi
prolixity	prolix
prologue	prologu
prologues	prologu
prolong	prolong
prolongs	prolong
promethean	promethean
prometheus	prometheu
promis	promi
promise	promis
promised	promis
promises	promis
promiseth	promiseth
promising	promis
promontory	promontori
promotion	promot
promotions	promot
prompt	prompt
prompted	prompt
promptement	promptement
prompter	prompter
prompting	prompt
prompts	prompt
prompture	promptur
promulgate	promulg
prone	prone
prononcer	prononc
prononcez	
prononcez	
pronoun	pronoun
pronounc	pronounc
pronounce	pronounc
pronounced	pronounc
pronouncing	pronounc
pronouns	pronoun

proof	proof
proofs	proof
prop	prop
propagate	propag
propagation	propag
propend	propend
propension	propens
proper	proper
properer	proper
properly	properli
propertied	properti
properties	properti
property	properti
prophecies	propheci
prophecy	propheci
prophesied	prophesi
prophesier	prophesi
prophesy	prophesi
prophesying	prophesi
prophet	prophet
prophetess	prophetess
prophetic	prophet
prophetically	prophet
prophets	
prophet	
propinquity	propinqu
propontic	propont
proportion	proport
proportionable	proportion
proportions	proport
propos	propo
propose	propos
proposed	propos
proposer	propos
proposes	propos
proposing	propos
proposition	proposit
propositions	proposit
propounded	propound
propp	propp
propre	propr
propriety	proprieti
props	prop
propugnation	propugn
prorogue	prorogu
prorogued	prorogu
proscription	proscript
proscriptions	proscript

prose	prose
prosecute	prosecut
prosecution	prosecut
proselytes	proselyt
proserpina	proserpina
prosp	prosp
prospect	prospect
prosper	prosper
prosperity	prosper
prospero	prospero
prosperous	prosper
prosperously	prosper
prosper	prosper
prostitute	prostitut
prostrate	prostrat
protect	protect
protected	protect
protection	protect
protector	protector
protectors	protector
protectorship	protectorship
protectress	protectress
protects	protect
protest	protest
protestation	protest
protestations	protest
protested	protest
protester	protest
protesting	protest
protests	protest
proteus	proteu
protheus	protheu
protract	protract
protractive	protract
proud	proud
prouder	prouder
proudest	
proudest	
proudlier	proudlier
proudly	proudli
prouds	proud
prov	prov
provand	provand
prove	prove
proved	prove
provender	provend
proverb	proverb
proverbs	proverb

proves	prove
proveth	proveth
provide	provid
provided	provid
providence	provid
provident	provid
providently	provid
provider	provid
provides	provid
province	provinc
provinces	provinc
provincial	provinci
proving	prove
provision	provis
proviso	proviso
provocation	provoc
provok	provok
provoke	provok
provoked	provok
provoker	provok
provokes	
provok	
provoketh	provoketh
provoking	provok
provost	provost
prowess	prowess
prudence	prudenc
prudent	prudent
prun	prun
prune	prune
prunes	prune
pruning	prune
pry	pry
prying	pry
psalm	psalm
psalmist	psalmist
psalms	psalm
psalteries	psalteri
ptolemies	ptolemi
ptolemy	ptolemi
public	public
publican	publican
publication	public
publicly	publicli
publicola	publicola
publish	publish
published	publish
publisher	publish

publishing	publish
publius	publiu
pucelle	puce
puck	puck
pudder	
pudder	
pudding	pu
puddings	pu
puddle	pu
puddled	pu
puddency	pu
pueritia	pueritia
puff	puff
puffing	puf
puffs	puff
pugging	pug
puis	pui
puissance	puissanc
puissant	puissant
puke	puke
puking	puke
pulcher	pulcher
puling	pule
pull	pull
puller	puller
pullet	pullet
pulling	pull
pulls	pull
pulpit	pulpit
pulpiter	pulpit
pulpits	pulpit
pulse	puls
pulsidge	pulsidg
pump	pump
pumpion	pumpion
pumps	pump
pun	pun
punched	punch
punish	punish
punished	punish
punishes	punish
punishment	punish
punishments	punish
punk	punk
punto	punto
puny	puni
pupil	pupil
pupils	pupil

puppet	puppet
puppets	puppet
puppies	puppi
puppy	puppi
pur	pur
purblind	purblind
purchas	purcha
purchase	purchas
purchased	purchas
purchases	purchas
purchaseth	purchaseth
purchasing	purchas
pure	pure
purely	pure
purer	purer
purest	purest
purg	purg
purgation	purgat
purgative	purg
purgatory	purgatori
purge	purg
purged	
purg	
purgers	purger
purging	purg
purifies	purifi
purifying	purifi
puritan	puritan
purity	puriti
purlieus	purlieu
purple	purpl
purpled	purpl
purples	purpl
purport	purport
purpos	purpo
purpose	purpos
purposed	purpos
purposely	purpos
purposes	purpos
purposeth	purposeth
purposing	purpos
purr	purr
purs	pur
purse	purs
pursents	pursent
purses	purs
pursu	pursu
pursue	pursu

pursued	pursu
pursuers	pursuer
pursues	pursu
pursuest	pursuest
pursueth	pursueth
pursuing	pursu
pursuit	pursuit
pursuivant	pursuiv
pursuivants	pursuiv
pursy	pursi
purus	puru
purveyor	purveyor
push	push
pushes	push
pusillanimity	pusillanim
put	put
putrefy	putrefi
putrified	putrifi
puts	put
putter	putter
putting	put
puttock	puttock
puzzel	puzzel
puzzle	puzzl
puzzled	puzzl
puzzles	puzzl
py	py
pygmalion	pygmalion
pygmies	pygmi
pygmy	pygmi
pyramid	pyramid
pyramides	pyramid
pyramids	pyramid
pyramis	pyrami
pyramises	pyramis
pyramus	pyramu
pyreanean	pyreanean
pyrrhus	
	pyrrhu
pythagoras	pythagora
qu	qu
quadrangle	quadrangl
quae	quae
quaff	quaff
quaffing	quaf
quagmire	quagmir
quail	quail
quailing	quail

quails	quail
quaint	quaint
quaintly	quaintli
quak	quak
quake	quak
quakes	quak
qualification	qualif
qualified	qualifi
qualifies	qualifi
qualify	qualifi
qualifying	qualifi
qualite	qualit
qualities	qualiti
quality	qualiti
qualm	qualm
qualmish	qualmish
quam	quam
quand	quand
quando	quando
quantities	quantiti
quantity	quantiti
quare	
quar	
quarrel	quarrel
quarrell	quarrel
quarreller	quarrel
quarrelling	quarrel
quarrelous	quarrel
quarrels	quarrel
quarrelsome	quarrelsom
quarries	quarri
quarry	quarri
quart	quart
quarter	quarter
quartered	quarter
quartering	quarter
quarters	quarter
quarts	quart
quasi	quasi
quat	quat
quatch	quatch
quay	quai
que	que
quean	quean
queas	quea
queasiness	queasi
queasy	queasi
queen	queen

queens	queen
quell	quell
queller	queller
quench	quench
quenched	quench
quenching	quench
quenchless	quenchless
quern	quern
quest	quest
questant	questant
question	question
questionable	question
questioned	question
questioning	question
questionless	questionless
questions	question
questrists	questrist
quests	quest
queubus	queubu
qui	qui
quick	quick
quicken	quicken
quickens	quicken
quicker	quicker
quicklier	quicklier
quickly	quickli
quickness	quick
quicksand	quicksand
quicksands	quicksand
quicksilver	quicksilver
quid	quid
quiddities	quidditi
quiddits	quiddit
quier	quier
quiet	quiet
quieter	quieter
quietly	quietli
quietness	quiet
quietus	quietu
quill	quill
quilletts	quillet
quills	quill
quilt	quilt
quinapalus	quinapalu
quince	quinc
quinces	quinc
quintain	quintain

quintessence	quintess
quintus	quintu
quip	quip
quips	quip
quire	quir
quiring	quir
quirk	quirk
quirks	quirk
quis	qui
quit	quit
quite	quit
quits	quit
quittance	quittanc
quitted	quit
quitting	quit
quiver	quiver
quivering	quiver
quivers	quiver
quo	quo
quod	quod
quoifs	quoif
quoint	quoint
quoit	quoit
quoits	quoit
quondam	quondam
quoniam	quoniam
quote	quot
quoted	quot
quotes	quot
quoth	quoth
quotidian	quotidian
r	r
rabbit	rabbit
rabble	rabbl
rabblement	rabblement
race	race
rack	rack
rackers	racker
racket	racket
rackets	racket
racking	rack
racks	rack
radiance	radianc
radiant	radiant
radish	radish
rafe	rafe
raft	raft

rag	rag
rage	rage
rages	rage
rageth	rageth
ragg	ragg
ragged	rag
raggedness	
ragged	
raging	rage
ragozine	ragozin
rags	rag
rah	rah
rail	rail
railed	rail
railer	railer
railest	railest
raileth	raileth
railing	rail
rails	rail
raiment	raiment
rain	rain
rainbow	rainbow
raineth	raineth
raining	rain
rainold	rainold
rains	rain
rainy	raini
rais	rai
raise	rais
raised	rais
raises	rais
raising	rais
raisins	raisin
rak	rak
rake	rake
rakers	raker
rakes	rake
ral	ral
rald	rald
ralph	
ralph	
ram	ram
rambures	rambur
ramm	ramm
rampallian	rampallian
rampant	rampant
ramping	ramp
rampir	rampir

ramps	ramp
rams	ram
ramsey	ramsei
ramston	ramston
ran	ran
rance	ranc
rancorous	rancor
rancors	rancor
rancour	rancour
random	random
rang	rang
range	rang
ranged	rang
rangers	ranger
ranges	rang
ranging	rang
rank	rank
ranker	ranker
rankest	rankest
ranking	rank
rankle	rankl
rankly	rankli
rankness	rank
ranks	rank
ransack	ransack
ransacking	ransack
ransom	ransom
ransomed	ransom
ransoming	ransom
ransomless	ransomless
ransoms	ransom
rant	rant
ranting	rant
rap	rap
rape	rape
rapes	rape
rapier	rapier
rapiers	rapier
rapine	rapin
raps	rap
rapt	rapt
rapture	raptur
raptures	raptur
rar	rar
rare	rare
rarely	rare
rareness	rare
rarer	rarer

rarest	rarest
rarities	rariti
rarity	rariti
rascal	rascal
rascalliest	rascalliest
rascally	rascal
rascals	rascal
rased	rase
rash	
rash	
rasher	rasher
rashly	rashli
rashness	rash
rat	rat
ratcatcher	ratcatch
ratcliff	ratcliff
rate	rate
rated	rate
rately	rate
rates	rate
rather	rather
ratherest	ratherest
ratified	ratifi
ratifiers	ratifi
ratify	ratifi
rating	rate
rational	ration
ratolorum	ratolorum
rats	rat
ratsbane	ratsban
rattle	rattl
rattles	rattl
rattling	rattl
rature	ratur
raught	raught
rav	rav
rave	rave
ravel	ravel
raven	raven
ravening	raven
ravenous	raven
ravens	
raven	
ravenspurgh	ravenspurgh
raves	rave
ravin	ravin
raving	rave
ravish	ravish

ravished	ravish
ravisher	ravish
ravishing	ravish
ravishments	ravish
raw	raw
rawer	rawer
rawly	rawli
rawness	raw
ray	rai
rayed	rai
rays	rai
raz	raz
raze	raze
razed	raze
razes	raze
razeth	razeth
razing	raze
razor	razor
razorable	razor
razors	razor
razure	razur
re	re
reach	reach
reaches	reach
reacheth	reacheth
reaching	reach
read	read
reader	
	reader
readiest	readiest
readily	readili
readiness	readi
reading	read
readins	readin
reads	read
ready	readi
real	real
really	realli
realm	realm
realms	realm
reap	reap
reapers	reaper
reaping	reap
reaps	reap
rear	rear
rears	rear
rearward	rearward
reason	reason

reasonable	reason
reasonably	reason
reasoned	reason
reasoning	reason
reasonless	reasonless
reasons	reason
reave	reav
rebate	rebat
rebato	rebato
rebeck	rebeck
rebel	rebel
rebell	rebel
rebelling	rebel
rebellion	rebellion
rebellious	rebelli
rebels	rebel
rebound	rebound
rebuk	rebuk
rebuke	rebuk
rebukeable	rebuk
rebuked	rebuk
rebukes	rebuk
rebus	rebu
recall	recal
recant	recant
recantation	recant
recanter	recant
recanting	recant
receipt	receipt
receipts	receipt
receiv	receiv
receive	receiv
received	receiv
receiver	receiv
receives	receiv
receivest	receivest
receiveth	receiveth
receiving	receiv
receptacle	receptacl
rechate	rechat
reciprocal	reciproc
reciprocally	reciproc
recite	recit
recited	recit
reciterai	reciterai
reck	reck
recking	reck
reckless	reckless

reckon	reckon
reckoned	reckon
reckoning	reckon
reckonings	reckon
recks	reck
reclaim	reclaim
reclaims	reclaim
reclusive	reclus
recognizance	recogniz
recognizances	recogniz
recoil	recoil
recoiling	recoil
recollected	recollect
recomforted	recomfort
recomforture	recomfortur
recommend	recommend
recommended	recommend
recommends	recommend
recompens	recompen
recompense	recompens
reconcil	reconcil
reconcile	reconcil
reconciled	reconcil
reconcilement	reconcil
reconciler	reconcil
reconciles	reconcil
reconciliation	reconcili
record	record
recordation	record
recorded	record
recorder	record
recorders	record
records	record
recount	recount
recounted	recount
recounting	recount
recountments	recount
recounts	recount
recourse	recours
recov	recov
recover	recov
recoverable	recover
recovered	recov
recoveries	recoveri
recovers	recov
recovery	recoveri
recreant	recreant
recreants	recreant

recreate	recreat
recreation	recreat
rectify	rectifi
rector	rector
rectorship	rectorship
recure	recur
recured	recur
red	
red	
redbreast	redbreast
redder	redder
reddest	reddest
rede	rede
redeem	redeem
redeemed	redeem
redeemer	redeem
redeeming	redeem
redeems	redeem
redeliver	redeliv
redemption	redempt
redime	redim
redness	red
redoubled	redoubl
redoubted	redoubt
redound	redound
redress	redress
redressed	redress
redresses	redress
reduce	reduc
reechy	reechi
reed	reed
reeds	reed
reek	reek
reeking	reek
reeks	reek
reeky	reeki
reel	reel
reeleth	reeleth
reeling	reel
reels	reel
refell	
refel	
refer	refer
reference	refer
referr	referr
referred	refer
refigured	refigur
refin	refin

refined	refin
reflect	reflect
reflecting	reflect
reflection	reflect
reflex	reflex
reform	reform
reformation	reform
reformed	reform
refractory	refractori
refrain	refrain
refresh	refresh
refreshing	refresh
reft	reft
refts	reft
refuge	refug
refus	refu
refusal	refus
refuse	refus
refused	refus
refusest	refusest
refusing	refus
reg	reg
regal	regal
regalia	regalia
regan	
regan	
regard	regard
regardance	regard
regarded	regard
regardfully	regardfulli
regarding	regard
regards	regard
regenerate	regener
regent	regent
regentship	regentship
regia	regia
regiment	regiment
regiments	regiment
regina	regina
region	region
regions	region
regist	regist
register	regist
registers	regist
regreet	regreet
regreets	regreet
regress	regress
reguerdon	reguerdon

regular	regular
rehears	rehear
rehearsal	rehears
rehearse	rehears
reign	reign
reigned	reign
reignier	reignier
reigning	reign
reigns	
reign	
rein	rein
reinforc	reinforc
reinforce	reinforc
reinforcement	reinforc
reins	rein
reiterate	reiter
reject	reject
rejected	reject
rejoic	rejoic
rejoice	rejoic
rejoices	rejoic
rejoiceth	rejoiceth
rejoicing	rejoic
rejoicingly	rejoicingli
rejoindure	rejoindur
rejour	rejour
rel	rel
relapse	relaps
relate	relat
relates	relat
relation	relat
relations	relat
relative	rel
releas	relea
release	releas
released	releas
releasing	releas
relent	relent
relenting	relent
relents	relent
reliances	
relianc	
relics	relic
relief	relief
reliev	reliev
relieve	reliev
relieved	reliev
relieves	reliev

relieving	reliev
religion	religion
religions	religion
religious	religi
religiously	religi
relinquish	relinquish
reliques	reliqu
reliquit	reliquit
relish	relish
relume	relum
rely	reli
relying	reli
remain	remain
remainder	remaind
remainders	remaind
remained	remain
remaineth	remaineth
remaining	remain
remains	remain
remark	remark
remarkable	remark
remediate	remedi
remedied	remedi
remedies	remedi
remedy	
remedi	
rememb	rememb
remember	rememb
remembered	rememb
remembers	rememb
remembrance	remembr
remembrancer	remembranc
remembrances	remembr
remercimens	remercimen
remiss	remiss
remission	remiss
remissness	remiss
remit	remit
remnant	remnant
remnants	remnant
remonstrance	remonstr
remorse	remors
remorseful	remors
remorseless	remorseless
remote	remot
remotion	remot
remov	remov
remove	remov

removed	remov
removedness	removed
remover	remov
removes	remov
removing	remov
remunerate	remuner
remuneration	remuner
rence	renc
rend	
rend	
render	render
rendered	render
renders	render
rendezvous	rendezv
renegado	renegado
renege	reneg
reneges	reneg
renew	renew
renewed	renew
renewest	renewest
renounce	renounc
renouncement	renounc
renouncing	renounc
renowmed	renowm
renown	renown
renowned	renown
rent	rent
rents	rent
repaid	repaid
repair	repair
repaired	repair
repairing	repair
repairs	repair
repass	repass
repast	repast
repasture	repastur
repay	repai
repaying	repai
repays	repai
repeal	repeal
repealing	
repeal	
repeals	repeal
repeat	repeat
repeated	repeat
repeating	repeat
repeats	repeat
repel	repel

repent	repent
repentance	repent
repentant	repent
repented	repent
repenting	repent
repents	repent
repetition	repetit
repetitions	repetit
repin	repin
repine	repin
repining	repin
replant	replant
replenish	replenish
replenished	replenish
replete	replet
replication	replic
replied	repli
replies	repli
repliest	repliest
reply	repli
replying	repli
report	report
reported	report
reporter	report
reportest	reportest
reporting	report
reportingly	reportingli
reports	report
reposal	repos
repose	repos
reposeth	reposeth
reposing	repos
repossess	repossess
reprehend	reprehend
reprehended	reprehend
reprehending	reprehend
represent	repres
representing	repres
reprieve	repriev
reprieves	repriev
reprisal	repris
reproach	reproach
reproaches	reproach
reproachful	reproach
reproachfully	reproachfulli
reprobate	reprob
reprobation	reprob
reproof	reproof

reprov	reprov
reprove	reprov
reproveable	reprov
reproves	reprov
reproving	reprov
repugn	repugn
repugnancy	repugn
repugnant	repugn
repulse	repuls
repulsed	repuls
repurchas	repurcha
repured	repur
reputation	reput
repute	reput
reputed	reput
reputeless	reputeless
reputes	reput
reputing	reput
request	request
requested	request
requesting	request
requests	request
requiem	requiem
requir	requir
require	requir
required	requir
requires	requir
requireth	requireth
requiring	requir
requisite	requisit
requisites	requisit
requit	requit
requital	requit
requite	requit
requited	requit
requites	requit
rer	rer
rere	rere
rers	rer
rescu	rescu
rescue	rescu
rescued	rescu
rescues	rescu
rescuing	rescu
resemblance	resembl
resemble	resembl
resembled	resembl
resembles	resembl

resembleth	resembleth
resembling	resembl
reserv	reserv
reservation	reserv
reserve	reserv
reserved	reserv
reserves	reserv
reside	resid
residence	resid
resident	resid
resides	resid
residing	resid
residue	residu
resign	resign
resignation	resign
resist	resist
resistance	resist
resisted	resist
resisting	resist
resists	resist
resolute	resolut
resolutely	
resolut	
resolutes	resolut
resolution	resolut
resolve	resolv
resolved	resolv
resolvedly	resolvedli
resolves	resolv
resolveth	resolveth
resort	resort
resorted	resort
resounding	resound
resounds	resound
respeaking	respeak
respect	respect
respected	respect
respecting	respect
respective	respect
respectively	respect
respects	respect
respice	respic
respite	respit
respites	respit
responsive	respons
respose	respos
ress	ress

rest	rest
rested	rest
resteth	resteth
restful	rest
resting	rest
restitution	
restitut	
restless	restless
restor	restor
restoration	restor
restorative	restor
restore	restor
restored	restor
restores	restor
restoring	restor
restrain	restrain
restrained	restrain
restraining	restrain
restrains	restrain
restraint	restraint
rests	rest
resty	resti
resum	resum
resume	resum
resumes	resum
resurrections	resurrect
retail	retail
retails	retail
retain	retain
retainers	retain
retaining	retain
retell	retel
retention	retent
retentive	retent
retinue	retinu
retir	retir
retire	retir
retired	
retir	
retirement	retir
retires	retir
retiring	retir
retold	retold
retort	retort
retorts	retort
retourne	retourn
retract	retract
retreat	retreat

retrograde	retrograd
rets	ret
return	return
returned	return
returnest	returnest
returneth	returneth
returning	return
returns	return
revania	revania
reveal	reveal
reveals	reveal
revel	revel
reveler	revel
revell	revel
reveller	revel
revellers	revel
revelling	revel
revelry	revelri
revels	revel
reveng	reveng
revenge	reveng
revenged	
reveng	
revengeful	reveng
revengement	reveng
revenger	reveng
revengers	reveng
revenges	reveng
revenging	reveng
revengingly	revengingli
revenue	revenu
revenues	revenu
reverb	reverb
reverberate	reverber
reverbs	reverb
reverenc	reverenc
reverence	rever
reverend	reverend
reverent	rever
reverently	rever
revers	rever
reverse	revers
reversion	revers
reverted	revert
review	review
reviewest	reviewest
revil	revil
revile	revil

revisits	revisit
reviv	reviv
revive	reviv
revives	reviv
reviving	reviv
revok	
revok	
revoke	revok
revokement	revok
revolt	revolt
revolted	revolt
revolting	revolt
revolts	revolt
revolution	revolut
revolutions	revolut
revolve	revolv
revolving	revolv
reward	reward
rewarded	reward
rewarder	reward
rewarding	reward
rewards	reward
reword	reword
reworded	reword
rex	rex
rey	rei
reynaldo	reynaldo
rford	rford
rful	rful
rfull	rfull
rhapsody	rhapsodi
rheims	rheim
rhenish	rhenish
rhesus	rhesu
rhetoric	rhetor
rheum	rheum
rheumatic	rheumat
rheums	rheum
rheumy	rheumi
rhinoceros	rhinocero
rhodes	rhode
rhodope	rhodop
rhubarb	rhubarb
rhyrn	rhyrn
rhyme	rhyme
rhyrners	rhyrn
rhyrn	rhyme

rhyming	rhyme
rialto	rialto
rib	rib
ribald	ribald
riband	riband
ribands	riband
ribaudred	ribaudr
ribb	ribb
ribbed	rib
ribbon	ribbon
ribbons	ribbon
ribs	rib
rice	rice
rich	rich
richard	richard
richer	richer
riches	rich
richest	richest
richly	richli
richmond	richmond
richmonds	richmond
rid	rid
riddance	riddanc
ridden	ridden
riddle	riddl
riddles	riddl
riddling	riddl
ride	ride
rider	rider
riders	rider
rides	ride
ridest	ridest
rideth	rideth
ridge	ridg
ridges	ridg
ridiculous	ridicul
riding	ride
rids	rid
rien	rien
ries	ri
rifle	rifl
rift	rift
rifted	rift
rig	rig
rigg	rigg
riggish	riggish
right	right
righteous	righteou

righteously	righteous
rightful	right
rightfully	rightfulli
rightly	rightli
rights	right
rigol	rigol
rigorous	rigor
rigorously	rigor
rigour	rigour
ril	ril
rim	rim
rin	rin
rinaldo	rinaldo
rind	rind
ring	ring
ringing	ring
ringleader	ringlead
ringlets	ringlet
rings	ring
ringwood	ringwood
riot	riot
rioter	rioter
rioting	riot
riotous	riotou
riots	riot
rip	rip
ripe	ripe
ripely	ripe
ripen	ripen
ripened	ripen
ripeness	ripe
ripening	ripen
ripens	ripen
riper	riper
ripest	ripest
riping	ripe
ripp	ripp
ripping	rip
rise	rise
risen	
	risen
rises	rise
riseth	riseth
rish	rish
rising	rise
rite	rite
rites	rite
rivage	rivag

rival	rival
rivality	rival
rivall	rival
rivals	rival
rive	rive
rived	rive
rivelled	rivel
river	river
rivers	river
rivet	rivet
riveted	rivet
rivets	rivet
rivo	rivo
rj	rj
rless	rless
road	road
roads	road
roam	roam
roaming	roam
roan	roan
roar	roar
roared	roar
roarers	roarer
roaring	roar
roars	roar
roast	
	roast
roasted	roast
rob	rob
roba	roba
robas	roba
robb	robb
robbed	rob
robber	robber
robbers	robber
robbery	robber
robbing	rob
robe	robe
robed	robe
robert	robert
robes	robe
robin	robin
robs	rob
robustious	robusti
rochester	rochest
rochford	rochford
rock	rock
rocks	rock

rocky	rocki
rod	rod
rode	rode
roderigo	roderigo
rods	rod
roe	roe
roes	roe
roger	roger
rogero	rogero
rogue	rogu
roguery	rogueri
rogues	rogu
roguish	roguish
roi	roi
roisting	roist
roll	roll
rolled	roll
rolling	roll
rolls	roll
rom	rom
romage	romag
roman	roman
romano	romano
romanos	romano
romans	roman
rome	rome
romeo	romeo
romish	romish
rondure	rondur
ronyon	ronyon
rood	rood
roof	roof
roofs	roof
rook	rook
rooks	rook
rooky	rooki
room	room
rooms	room
root	root
rooted	root
rootedly	rootedli
rooteth	rooteth
rooting	root
roots	
	root
rope	rope
ropery	roperi
ropes	rope

roping	rope
ros	ro
rosalind	rosalind
rosalinda	rosalinda
rosalinde	rosalind
rosaline	rosalin
roscius	rosciu
rose	rose
rosed	rose
rosemary	rosemari
rosencrantz	rosencrantz
roses	rose
ross	ross
rosy	rosi
rot	rot
rote	rote
roted	rote
rother	rother
rotherham	rotherham
rots	rot
rotted	rot
rotten	rotten
rottenness	rotten
rotting	rot
rotundity	rotund
rouen	rouen
rough	rough
rougher	rougher
roughest	
	roughest
roughly	roughli
roughness	rough
round	round
rounded	round
roundel	roundel
rounder	rounder
roundest	roundest
rounding	round
roundly	roundli
rounds	round
roundure	roundur
rous	rou
rouse	rous
roused	rous
rousillon	rousillon
rously	rousli
roussi	roussi
rout	rout

routed	rout
routs	rout
rove	rove
rover	rover
row	row
rowel	rowel
rowland	rowland
rowlands	rowland
roy	roi
royal	royal
royalize	royal
royally	royal
royalties	royalti
royalty	royalti
roynish	roynish
rs	rs
rt	rt
rub	rub
rubb	rubb
rubbing	rub
rubbish	rubbish
rubies	rubi
rubious	rubiou
rubs	rub
ruby	rubi
rud	rud
rudand	rudand
rudder	rudder
ruddiness	ruddi
ruddock	ruddock
ruddy	ruddi
rude	rude
rudely	rude
rudeness	rude
ruder	ruder
rudesby	rudesbi
rudest	rudest
rudiments	rudiment
rue	rue
rued	ru
ruff	ruff
ruffian	ruffian
ruffians	ruffian
ruffle	ruffl
ruffling	ruffl
ruffs	
	ruff
rug	rug

rugby	rugbi
rugemount	rugemount
rugged	rug
ruin	ruin
ruinate	ruinat
ruined	ruin
ruining	ruin
ruinous	ruinou
ruins	ruin
rul	rul
rule	rule
ruled	rule
ruler	ruler
rulers	ruler
rules	rule
ruling	rule
rumble	rumbl
ruminaies	ruminai
ruminat	ruminat
ruminare	rumin
ruminated	rumin
ruminates	rumin
ruminare	rumin
rumor	rumor
rumour	rumour
rumourer	rumour
rumours	rumour
rump	rump
run	run
runagate	runag
runagates	
runag	
runaway	runawai
runaways	runawai
rung	rung
runn	runn
runner	runner
runners	runner
running	run
runs	run
rupture	ruptur
ruptures	ruptur
rural	rural
rush	rush
rushes	rush
rushing	rush
rushling	rushl
rushy	rushi

russet	russet
russia	russia
russian	russian
russians	russian
rust	rust
rusted	rust
rustic	rustic
rustically	rustic
rustics	rustic
rustle	rustl
rustling	rustl
rusts	rust
rusty	rusti
rut	rut
ruth	ruth
ruthful	ruth
ruthless	ruthless
rutland	rutland
ruttish	ruttish
ry	ry
rye	rye
rything	ryth
s	s
sa	sa
saba	saba
sabbath	sabbath
sable	sabl
sables	sabl
sack	sack
sackbut	sackbut
sackcloth	sackcloth
sacked	sack
sackerson	sackerson
sacks	sack
sacrament	sacrament
sacred	sacr
sacrific	sacrif
sacrifice	sacrific
sacrificers	sacrific
sacrifices	sacrific
sacrificial	sacrifici
sacrificing	sacrif
sacrilegious	sacrilegi
sacring	sacr
sad	sad
sadder	sadder
saddest	saddest
saddle	

saddl	
saddler	saddler
saddles	saddl
sadly	sadli
sadness	sad
saf	saf
safe	safe
safeguard	safeguard
safely	safe
safer	safer
safest	safest
safeties	safeti
safety	safeti
saffron	saffron
sag	sag
sage	sage
sagittary	sagittari
said	said
saidst	saidst
sail	sail
sailing	sail
sailmaker	sailmak
sailor	sailor
sailors	sailor
sails	sail
sain	sain
saint	saint
sainted	saint
saintlike	saintlik
saints	saint
saith	saith
sake	sake
sakes	
sake	
sala	sala
salad	salad
salamander	salamand
salary	salari
sale	sale
salerio	salerio
salicam	salicam
salique	saliqu
salisbury	salisburi
sall	sall
sallet	sallet
sallets	sallet
sallies	salli
sallow	sallow

sally	salli
salmon	salmon
salmons	salmon
salt	salt
salter	salter
saltiers	saltier
saltiness	salt
saltpetre	saltpetr
salutation	salut
salutations	salut
salute	salut
saluted	salut
salutes	salut
saluteth	saluteth
salv	salv
salvation	salvat
salve	salv
salving	
salv	
same	same
samingo	samingo
samp	samp
sampire	sampir
sample	sampl
sampler	sampler
sampson	sampson
samson	samson
samsons	samson
sancta	sancta
sanctified	sanctifi
sanctifies	sanctifi
sanctify	sanctifi
sanctimonies	sanctimoni
sanctimonious	sanctimoni
sanctimony	sanctimoni
sanctities	sanctiti
sanctity	sanctiti
sanctuarize	sanctuar
sanctuary	sanctuari
sand	sand
sandal	sandal
sandbag	sandbag
sanded	sand
sands	sand
sandy	sandi
sandys	sandi
sang	sang
sanguine	sanguin

sanguis	sangui
sanity	saniti
sans	san
santrailles	santrail
sap	sap
sapient	sapient
sapit	sapit
sapless	sapless
sapling	sapl
sapphire	sapphir
sapphires	sapphir
saracens	saracen
sarcenet	sarcenet
sard	sard
sardians	sardian
sardinia	sardinia
sardis	sardi
sarum	sarum
sat	sat
satan	satan
satchel	satchel
sate	sate
sated	sate
satiate	satiat
satiety	satieti
satin	satin
satire	satir
satirical	satir
satis	sati
satisfaction	satisfact
satisfied	satisfi
satisfies	satisfi
satisfy	
satisfi	
satisfying	satisfi
saturday	saturdai
saturdays	saturdai
saturn	saturn
saturnine	saturnin
saturninus	saturninu
satyr	satyr
satyrs	satyr
sauc	sauc
sauce	sauc
sauced	sauc
saucers	saucer
saucers	sauc
saucily	saucili

sauciness	sauci
saucy	sauci
sauf	sauf
saunder	saunder
sav	sav
savage	savag
savagely	savag
savageness	savag
savagery	savageri
savages	savag
save	save
saved	save
saves	save
saving	save
saviour	saviour
savory	savori
savour	savour
savouring	savour
savours	savour
savoury	savouri
savoy	savoi
saw	saw
sawed	saw
sawest	sawest
sawn	sawn
sawpit	sawpit
saws	saw
sawyer	sawyer
saxons	saxon
saxony	saxoni
saxton	saxton
say	sai
sayest	sayest
saying	sai
sayings	sai
says	sai
sayst	sayst
sblood	sblood
sc	sc
scab	scab
scabbard	scabbard
scabs	scab
scaffold	scaffold
scaffoldage	scaffoldag
scal	scal
scald	scald
scalded	scald

scalding	scald
scale	scale
scaled	
	scale
scales	scale
scaling	scale
scall	scall
scalp	scalp
scalps	scalp
scaly	scali
scamble	scambl
scambling	scambl
scamels	scamel
scan	scan
scandal	scandal
scandaliz	scandaliz
scandalous	scandal
scandy	scandi
scann	scann
scant	scant
scanted	scant
scanter	scanter
scanting	scant
scantling	scantl
scants	scant
scap	scap
scape	scape
scaped	scape
scapes	scape
scapeth	scapeth
scar	scar
scarce	scarce
scarcely	scarce
scarcity	scarceiti
scare	scare
scarecrow	scarecrow
scarecrows	scarecrow
scarf	scarf
scarfed	scarf
scarfs	scarf
scaring	scare
scarlet	scarlet
scarr	scarr
scarre	scarr
scars	scar
scarus	scaru
scath	scath
scathe	scath

scathful	scath
scatt	scatt
scatter	scatter
scattered	scatter
scattering	scatter
scatters	scatter
scelera	scelera
scelerisque	scelerisqu
scene	scene
scenes	scene
scent	scent
scented	scent
scept	scept
scepter	scepter
sceptre	sceptr
sceptred	sceptr
sceptres	sceptr
schedule	schedul
schedules	
	schedul
scholar	scholar
scholarly	scholarli
scholars	scholar
school	school
schoolboy	schoolboi
schoolboys	schoolboi
schoolfellows	schoolfellow
schooling	school
schoolmaster	schoolmast
schoolmasters	schoolmast
schools	school
sciatica	sciatica
sciaticas	sciatica
science	scienc
sciences	scienc
scimitar	scimitar
scion	scion
scions	scion
scissors	scissor
scoff	scoff
scoffer	scoffer
scoffing	scof
scoffs	scoff
scoggin	scoggin
scold	scold
scolding	scold
scolds	scold
sconce	sconce

scone	scone
scope	
scope	
scopes	scope
scorch	scorch
scorched	scorch
score	score
scored	score
scores	score
scoring	score
scorn	scorn
scorned	scorn
scornful	scorn
scornfully	scornfulli
scorning	scorn
scorns	scorn
scorpion	scorpion
scorpions	scorpion
scot	scot
scotch	scotch
scotches	scotch
scotland	scotland
scots	scot
scottish	scottish
scoundrels	scoundrel
scour	scour
scoured	scour
scourg	scourg
scourge	scourg
scouring	scour
scout	scout
scouts	scout
scowl	scowl
scrap	scrap
scrape	
scrape	
scraping	scrape
scraps	scrap
scratch	scratch
scratches	scratch
scratching	scratch
scream	scream
screams	scream
screech	screech
screeching	screech
screen	screen
screens	screen
screw	screw

screws	screw
scribbl	scribbl
scribbled	scribbl
scribe	scribe
scribes	scribe
scrimers	scrimer
scrip	scrip
scrippage	scrippag
scripture	scriptur
scriptures	scriptur
scrivener	scriven
scroll	scroll
scrolls	scroll
scroop	scroop
scrowl	scrowl
scroyles	scroyl
scrubbed	scrub
scruple	scrupl
scruples	
	scrupl
scrupulous	scrupul
scuffles	scuffl
scuffling	scuffl
scullion	scullion
sculls	scull
scum	scum
scurril	scurril
scurrility	scurril
scurrilous	scurril
scurvy	scurvi
scuse	scuse
scut	scut
scutcheon	scutcheon
scutcheons	scutcheon
scylla	scylla
scythe	scyth
scythed	scyth
scythia	scythia
scythian	scythian
sdeath	sdeath
se	se
sea	sea
seacoal	seacoal
seafaring	seafar
seal	seal
sealed	seal
sealing	seal
seals	seal

seam	seam
seamen	seamen
seamy	
seami	
seaport	seaport
sear	sear
searce	searc
search	search
searchers	searcher
searches	search
searcheth	searcheth
searching	search
seared	sear
seas	sea
seasick	seasick
seaside	seasid
season	season
seasoned	season
seasons	season
seat	seat
seated	seat
seats	seat
sebastian	sebastian
second	second
secondarily	secondarili
secondary	secondari
seconded	second
seconds	second
secrecy	secreci
secret	secret
secretaries	secretari
secretary	secretari
secretly	secretli
secrets	secret
sect	
sect	
sectary	sectari
sects	sect
secundo	secundo
secure	secur
securely	secur
securing	secur
security	secur
sedg	sedg
sedge	sedg
sedges	sedg
sedgy	sedgi
sedition	sedit

seditious	seedit
seduc	seduc
seduce	seduc
seduced	seduc
seducer	seduc
seducing	seduc
see	see
seed	seed
seeded	seed
seedness	seed
seeds	seed
seedsman	seedsman
seein	seein
seeing	see
seek	seek
seeking	seek
seeks	seek
seel	seel
seeling	seel
seely	seeli
seem	
	seem
seemed	seem
seemers	seemer
seemest	seemest
seemeth	seemeth
seeming	seem
seemingly	seemingly
seemly	seemli
seems	seem
seen	seen
seer	seer
sees	see
seese	sees
seest	seest
seethe	seeth
seethes	seeth
seething	seeth
seeting	seet
segregation	segreg
seigneur	seigneur
seigneurs	seigneur
seiz	seiz
seize	seiz
seized	seiz
seizes	seiz
seizeth	seizeth
seizing	seiz

seizure	seizur
seld	seld
seldom	seldom
select	select
seleucus	seleucu
self	
self	
selfsame	selfsam
sell	sell
seller	seller
selling	sell
sells	sell
selves	selv
semblable	semblabl
semblably	semblabl
semblance	semblanc
semblances	semblanc
semblative	sembl
semi	semi
semicircle	semicircl
semiramis	semirami
semper	semper
sempronius	semproni
senate	senat
senator	senat
senators	senat
send	send
sender	sender
sendeth	sendeth
sending	send
sends	send
seneca	seneca
senior	senior
seniory	seniori
senis	seni
sennet	sennet
senoys	senoi
sense	
sens	
senseless	senseless
senses	sens
sensible	sensibl
sensibly	sensibl
sensual	sensual
sensuality	sensual
sent	sent
sentenc	sentenc
sentence	sentenc

sentences	sentenc
sententious	sententi
sentinel	sentinel
sentinels	sentinel
separable	separ
separate	separ
separated	separ
separates	separ
separation	separ
septentrion	septentrion
sepulchre	sepulchr
sepulchres	sepulchr
sepulchring	sepulchr
sequel	sequel
sequence	sequenc
sequent	sequent
sequest	sequest
sequester	sequest
sequestration	sequestr
sere	sere
serenis	sereni
serge	
	serg
sergeant	sergeant
serious	seriou
seriously	serious
sermon	sermon
sermons	sermon
serpent	serpent
serpentine	serpentin
serpents	serpent
serpigo	serpigo
serv	serv
servant	servant
servanted	servant
servants	servant
serve	serv
served	serv
server	server
serves	serv
serveth	serveth
service	servic
serviceable	servic
services	servic
servile	servil
servility	servil
servilius	serviliu
serving	serv

servingman	servingman
servingmen	servingmen
serviteur	serviteur
servitor	servitor
servitors	servitor
servitude	servitud
sessa	sessa
session	session
sessions	session
sestos	sesto
set	set
setebos	setebo
sets	set
setter	setter
setting	set
settle	settl
settled	settl
settlest	settlest
settling	settl
sev	sev
seven	seven
sevenfold	sevenfold
sevensnight	sevensnight
seventeen	seventeen
seventh	seventh
seventy	seventi
sever	sever
several	sever
severally	sever
severals	sever
severe	sever
severed	sever
severely	sever
severest	severest
severing	sever
severity	sever
severn	
severn	
severs	sever
sew	sew
seward	seward
sewer	sewer
sewing	sew
sex	sex
sexes	sex
sexton	sexton
sextus	sextu
seymour	seymour

seyton	seyton
sfoot	sfoot
sh	sh
shackle	shackl
shackles	shackl
shade	shade
shades	shade
shadow	shadow
shadowed	shadow
shadowing	shadow
shadows	shadow
shadowy	shadowi
shady	shadi
shafalus	shafalu
shaft	shaft
shafts	shaft
shag	shag
shak	shak
shake	shake
shaked	shake
shaken	shaken
shakes	
shake	
shaking	shake
shales	shale
shall	shall
shallenge	shalleng
shallow	shallow
shallowest	shallowest
shallowly	shallowli
shallows	shallow
shalt	shalt
sham	sham
shambles	shambl
shame	shame
shamed	shame
shameful	shame
shamefully	shamefulli
shameless	shameless
shames	shame
shamest	shamest
shaming	shame
shank	shank
shanks	shank
shap	shap
shape	shape
shaped	shape
shapeless	shapeless

shapen	shapen
shapes	shape
shaping	shape
shar	shar
shard	shard
sharded	shard
shards	shard
share	share
shared	share
sharers	sharer
shares	share
sharing	share
shark	shark
sharp	sharp
sharpen	sharpen
sharpened	sharpen
sharpens	sharpen
sharper	sharper
sharpest	sharpest
sharply	sharpli
sharpness	sharp
sharps	sharp
shatter	shatter
shav	shav
shave	shave
shaven	shaven
shaw	shaw
she	she
sheaf	sheaf
sheal	sheal
shear	shear
shearers	shearer
shearing	shear
shearman	shearman
shears	shear
sheath	sheath
sheathe	sheath
sheathed	
sheath	
sheathes	sheath
sheathing	sheath
sheaved	sheav
sheaves	sheav
shed	shed
shedding	shed
sheds	shed
sheen	sheen
sheep	sheep

sheepcote	sheepcot
sheepcotes	sheepcot
sheeps	sheep
sheepskins	sheepskin
sheer	sheer
sheet	sheet
sheeted	sheet
sheets	sheet
sheffield	sheffield
shelf	shelf
shell	shell
shells	shell
shelt	shelt
shelter	shelter
shelters	shelter
shelves	shelv
shelving	shelv
shelvy	shelvi
shent	shent
shepherd	shepherd
shepherdes	shepherd
shepherdess	shepherdess
shepherdesses	shepherdess
shepherds	shepherd
sher	sher
sheriff	sheriff
sherris	sherri
shes	she
sheweth	sheweth
shield	shield
shielded	shield
shields	shield
shift	shift
shifted	shift
shifting	shift
shifts	shift
shilling	shill
shillings	shill
shin	shin
shine	shine
shines	shine
shineth	shineth
shining	shine
shins	shin
shiny	shini
ship	ship
shipboard	shipboard
shipman	shipman

shipmaster	shipmast
shipmen	shipmen
shipp	shipp
shipped	ship
shipping	ship
ships	
	ship
shipt	shipt
shipwreck	shipwreck
shipwrecking	shipwreck
shipwright	shipwright
shipwrights	shipwright
shire	shire
shirley	shirlei
shirt	shirt
shirts	shirt
shive	shive
shiver	shiver
shivering	shiver
shivers	shiver
shoal	shoal
shoals	shoal
shock	shock
shocks	shock
shod	shod
shoe	shoe
shoeing	shoe
shoemaker	shoemak
shoes	shoe
shog	shog
shone	shone
shook	shook
shoon	shoon
shoot	shoot
shooter	shooter
shootie	shooti
shooting	shoot
shoots	
shoot	
shop	shop
shops	shop
shore	shore
shores	shore
shorn	shorn
short	short
shortcake	shortcak
shorten	shorten
shortened	shorten

shortens	shorten
shorter	shorter
shortly	shortli
shortness	short
shot	shot
shotten	shotten
shoughs	shough
should	should
shoulder	shoulder
shouldering	shoulder
shoulders	shoulder
shouldst	shouldst
shout	shout
shouted	shout
shouting	shout
shouts	shout
shov	shov
shove	shove
shovel	shovel
shovels	shovel
show	show
showed	show
shower	
	shower
showers	shower
showest	showest
showing	show
shown	shown
shows	show
shreds	shred
shrew	shrew
shrewd	shrewd
shrewdly	shrewdli
shrewdness	shrewd
shrewish	shrewish
shrewishly	shrewishli
shrewishness	shrewish
shrews	shrew
shrewsbury	shrewsburi
shriek	shriek
shrieking	shriek
shrieks	shriek
shrieve	shriev
shrift	shrift
shrill	shrill
shriller	shriller
shrills	shrill
shrilly	shrilli

shrimp	shrimp
shrine	shrine
shrink	shrink
shrinking	shrink
shrinks	shrink
shriv	shriv
shrive	
	shrive
shriver	shriver
shrives	shrive
shriving	shrive
shroud	shroud
shrouded	shroud
shrouding	shroud
shrouds	shroud
shrove	shrove
shrow	shrow
shrows	shrow
shrub	shrub
shrubs	shrub
shrug	shrug
shrugs	shrug
shrunk	shrunk
shudd	shudd
shudders	shudder
shuffl	shuffl
shuffle	shuffl
shuffled	shuffl
shuffling	shuffl
shun	shun
shunless	shunless
shunn	shunn
shunned	shun
shunning	shun
shuns	shun
shut	shut
shuts	shut
shuttle	shuttl
shy	shy
shylock	shylock
si	si
sibyl	sibyl
sibylla	sibylla
sibyls	sibyl
sicil	sicil
sicilia	sicilia
sicilian	sicilian

sicilius	siciliu
sicils	sicil
sicily	sicili
sicinius	siciniu
sick	sick
sicken	sicken
sickens	sicken
sicker	sicker
sickle	sickl
sicklemen	sicklemen
sicklied	sickli
sickliness	sickli
sickly	sickli
sickness	sick
sicles	sicl
sicyon	sicyon
side	side
sided	side
sides	side
siege	sieg
sieges	sieg
sienna	sienna
sies	si
sieve	siev
sift	sift
sifted	sift
sigeia	sigeia
sigh	sigh
sighed	sigh
sighing	sigh
sighs	sigh
sight	sight
sighted	sight
sightless	sightless
sightly	sightli
sights	sight
sign	sign
signal	signal
signet	signet
signieur	signieur
significant	signific
significants	signific
signified	signifi
signifies	signifi
signify	signifi
signifying	signifi
signior	signior
signiories	signiori

signiors	signior
signiory	signiori
signor	signor
signories	signori
signs	sign
signum	signum
silenc	silenc
silence	
	silenc
silenced	silenc
silencing	silenc
silent	silent
silently	silent
silius	siliu
silk	silk
silken	silken
silkman	silkman
silks	silk
silliest	silliest
silliness	silli
silling	sill
silly	silli
silva	silva
silver	silver
silvered	silver
silverly	silverli
silvia	silvia
silvius	silviu
sima	sima
simile	simil
similes	simil
simois	simoi
simon	simon
simony	simoni
simp	simp
simpcox	simpcox
simple	simpl
simpleness	simpl
simpler	simpler
simples	simpl
simplicity	simplic
simply	simpli
simular	simular
simulation	simul
sin	sin
since	sinc
sincere	sincer
sincerely	sincer

sincerity	sincer
sinel	sinel
sinew	sinew
sinewed	sinew
sinews	sinew
sinewy	sinewi
sinful	sin
sinfully	sinfulli
sing	sing
singe	sing
singeing	sing
singer	singer
singes	sing
singeth	singeth
singing	sing
single	singl
singled	singl
singleness	singl
singly	singli
sings	sing
singular	singular
singulariter	singularit
singularities	singular
singularity	
singular	
singuled	singul
sinister	sinist
sink	sink
sinking	sink
sinks	sink
sinn	sinn
sinner	sinner
sinner	sinner
sinning	sin
sinon	sinon
sins	sin
sip	sip
sipping	sip
sir	sir
sire	sire
siren	siren
sirrah	sirrah
sirs	sir
sist	sist
sister	sister
sisterhood	sisterhood
sisterly	sisterli
sisters	sister

sit	sit
sith	sith
sithence	sithenc
sits	sit
sitting	sit
situate	situat
situation	situat
situations	situat
siward	siward
six	six
sixpence	sixpenc
sixpences	sixpenc
sixpenny	sixpenni
sixteen	sixteen
sixth	sixth
sixty	sixti
siz	siz
size	size
sizes	size
sizzle	sizzl
skains	skain
skamble	skambl
skein	skein
skelter	skelter
skies	ski
skilful	skil
skilfully	skilfulli
skill	skill
skillless	skillless
skillet	skillet
skillful	skill
skills	skill
skim	skim
skimble	skimbl
skin	skin
skinker	skinker
skinny	skinni
skins	skin
skip	skip
skipp	skipp
skipper	
skipper	
skipping	skip
skirmish	skirmish
skirmishes	skirmish
skirr	skirr
skirted	skirt
skirts	skirt

skittish	skittish
skulking	skulk
skull	skull
skulls	skull
sky	sky
skyey	skyei
skyish	skyish
slab	slab
slack	slack
slackly	slackli
slackness	slack
slain	slain
slake	slake
sland	sland
slander	slander
slandered	slander
slanderer	slander
slanderers	slander
slandering	slander
slanderous	slander
slanders	slander
slash	slash
slaught	slaught
slaughter	slaughter
slaughtered	slaughter
slaughterer	slaughter
slaughterman	slaughterman
slaughtermen	slaughtermen
slaughterous	slaughter
slaughters	slaughter
slave	slave
slaver	slaver
slavery	slaveri
slaves	slave
slavish	slavish
slay	slai
slayeth	slayeth
slaying	slai
slays	slai
sleave	sleav
sledded	sled
sleek	sleek
sleekly	sleekli
sleep	sleep
sleep	sleep
sleepers	sleepers
sleepers	sleepers
sleepiest	sleepiest
sleeping	sleep

sleeps	sleep
sleepy	sleepi
sleeve	sleev
sleeves	sleev
sleid	sleid
sleided	sleid
sleight	sleight
sleights	sleight
slender	slender
slenderer	slender
slenderly	slenderli
slept	slept
slew	slew
slewest	slewest
slice	slice
slid	slid
slide	slide
slides	slide
sliding	slide
slight	slight
slighted	slight
slightest	slightest
slightly	slightli
slightness	slight
slights	slight
slily	slili
slime	slime
slimy	slimi
slings	sling
slink	slink
slip	slip
slipp	slipp
slipper	slipper
slippers	slipper
slippery	slipperi
slips	slip
slish	slish
slit	slit
sliver	sliver
slobb	
	slobb
sloMBER	sloMBER
slop	slop
slope	slope
slops	slop
sloth	sloth
slothful	sloth
slough	slough

slovenly	slovenli
slovenry	slovenri
slow	slow
slower	slower
slowly	slowli
slowness	slow
slubber	slubber
slug	slug
sluggard	sluggard
sluggardiz	sluggardiz
sluggish	sluggish
sluic	sluic
slumb	slumb
slumber	slumber
slumbers	slumber
slumbery	slumberi
slunk	slunk
slut	slut
sluts	slut
sluttery	slutteri
sluttish	sluttish
sluttishness	sluttish
sly	sly
slys	
sly	
smack	smack
smacking	smack
smacks	smack
small	small
smaller	smaller
smallest	smallest
smallness	small
smalus	smalu
smart	smart
smarting	smart
smartly	smartli
smatch	smatch
smatter	smatter
smear	smear
smell	smell
smelling	smell
smells	smell
smelt	smelt
smil	smil
smile	smile
smiled	smile
smiles	smile
smilest	smilest

smilets	smilet
smiling	smile
smilingly	smilingli
smirch	smirch
smirched	smirch
smit	smit
smite	smite
smites	smite
smith	
	smith
smithfield	smithfield
smock	smock
smocks	smock
smok	smok
smoke	smoke
smoked	smoke
smokes	smoke
smoking	smoke
smoky	smoki
smooth	smooth
smoothed	smooth
smoothing	smooth
smoothly	smoothli
smoothness	smooth
smooths	smooth
smote	smote
smoth	smoth
smother	smother
smothered	smother
smothering	smother
smug	smug
smulkin	smulkin
smutch	smutch
snaffle	snaffl
snail	snail
snails	snail
snake	snake
snakes	snake
snaky	snaki
snap	snap
snapp	snapp
snapper	snapper
snar	snar
snare	snare
snares	snare
snarl	snarl
snarleth	snarleth
snarling	snarl

snatch	snatch
snatchers	snatcher
snatches	snatch
snatching	snatch
sneak	sneak
sneaking	sneak
sneap	sneap
sneaping	sneap
sneck	sneck
snip	snip
snipe	snipe
snipt	snipt
snore	snore
snores	snore
snoring	snore
snorting	snort
snout	snout
snow	snow
snowballs	snowbal
snowed	snow
snowy	snowi
snuff	snuff
snuffs	snuff
snug	snug
so	so
soak	soak
soaking	soak
soaks	soak
soar	soar
soaring	soar
soars	soar
sob	sob
sobbing	sob
sober	sober
soberly	soberli
sobriety	sobrieti
sobs	sob
sociable	sociabl
societies	societi
society	societi
socks	sock
socrates	socrat
sod	sod
sodden	sodden
soe	soe
soever	soever
soft	soft
soften	soften

softens	soften
softer	softer
softest	softest
softly	softli
softness	soft
soil	soil
soiled	soil
soilure	soilur
soit	soit
sojourn	
sojourn	
sol	sol
sola	sola
solace	solac
solanio	solanio
sold	sold
soldat	soldat
solder	solder
soldest	soldest
soldier	soldier
soldiers	soldier
soldiership	soldiership
sole	sole
solely	sole
solem	solem
solemn	solemn
solemnness	solem
solemnities	solemn
solemnity	solemn
solemniz	solemniz
solemnize	solemn
solemnized	solemn
solemnly	solemnli
soles	sole
solicit	solicit
solicitation	solicit
solicited	solicit
soliciting	solicit
solicitings	solicit
solicitor	solicitor
solicits	solicit
solid	
solid	
solidares	solidar
solidity	solid
solinus	solinu
solitary	solitari
solomon	solomon

solon	solon
solum	solum
solus	solu
solyman	solyman
some	some
somebody	somebodi
someone	someon
somerset	somerset
somerville	somervil
something	someth
sometime	sometim
sometimes	sometim
somever	somev
somewhat	somewhat
somewhere	somewher
somewhither	somewhith
somme	somm
son	son
sonance	sonanc
song	song
songs	song
sonnet	sonnet
sonneting	sonnet
sonnets	sonnet
sons	son
sont	
sont	
sonties	sonti
soon	soon
sooner	sooner
soonest	soonest
sooth	sooth
soothe	sooth
soothers	soother
soothing	sooth
soothsay	soothsai
soothsayer	soothsay
sooty	sooti
sop	sop
sophister	sophist
sophisticated	sophist
sophy	sophi
sops	sop
sorcerer	sorcer
sorcerers	sorcer
sorceress	sorceress
sorceries	sorceri
sorcery	sorceri

sore	sore
sorel	sorel
sorely	sore
sorer	sorer
sores	sore
sorrier	sorrier
sorriest	sorriest
sorrow	sorrow
sorrowed	sorrow
sorrowest	sorrowest
sorrowful	sorrow
sorrowing	sorrow
sorrows	sorrow
sorry	sorri
sort	sort
sortance	sortanc
sorted	sort
sorting	sort
sorts	sort
sossius	sossiu
sot	sot
soto	soto
sots	sot
sottish	sottish
soud	soud
sought	sought
soul	soul
sould	sould
soulless	soulless
souls	soul
sound	sound
sounded	sound
sounder	sounder
soundest	soundest
sounding	sound
soundless	soundless
soundly	soundli
soundness	sound
soundpost	soundpost
sounds	sound
sour	sour
source	
sourc	
sources	sourc
sourest	sourest
sourly	sourli
sours	sour
sous	sou

souse	sous
south	south
southam	southam
southampton	southampton
southerly	southerli
southern	southern
southward	southward
southwark	southwark
southwell	southwel
souviendrai	souviendrai
sov	sov
sovereign	sovereign
sovereignest	sovereignest
sovereignly	sovereignli
sovereignty	sovereignti
sovereignvours	sovereignvour
sow	sow
sowing	sow
sowl	sowl
sowter	sowter
space	space
spaces	space
spacious	spaciou
spade	spade
spades	spade
spain	
	spain
spak	spak
spake	spake
spakest	spakest
span	span
spangle	spangl
spangled	spangl
spaniard	spaniard
spaniel	spaniel
spaniels	spaniel
spanish	spanish
spann	spann
spans	span
spar	spar
spare	spare
spares	spare
sparing	spare
sparingly	sparingli
spark	spark
sparkle	sparkl
sparkles	sparkl
sparkling	sparkl

sparks	spark
sparrow	sparrow
sparrows	sparrow
sparta	sparta
spartan	spartan
spavin	spavin
spavins	spavin
spawn	spawn
speak	speak
speaker	
speaker	
speakers	speaker
speakest	speakest
speaketh	speaketh
speaking	speak
speaks	speak
spear	spear
speargrass	speargrass
spears	spear
special	special
specialities	special
specially	special
specialties	specialti
specialty	specialti
specify	specifi
speciously	specious
spectacle	spectacl
spectacled	spectacl
spectacles	spectacl
spectators	spectat
spectatorship	spectatorship
speculation	specul
speculations	specul
speculative	specul
sped	sped
speech	speech
speeches	speech
speechless	speechless
speed	speed
speeded	speed
speedier	speedier
speediest	speediest
speedily	speedili
speediness	speedi
speeding	speed
speeds	speed
speedy	speedi
speens	speen

spell	spell
spelling	spell
spells	spell
spelt	spelt
spencer	spencer
spend	spend
spendest	spendest
spending	spend
spends	spend
spendthrift	spendthrift
spent	spent
sperato	sperato
sperm	sperm
spero	spero
sperr	sperr
spher	spher
sphere	sphere
sphered	sphere
spheres	sphere
spherical	spheric
sphery	spheri
sphinx	sphinx
spice	spice
spiced	spice
spicery	spiceri
spices	spice
spider	spider
spiders	spider
spied	spi
spies	spi
spieth	spieth
spightfully	spightfulli
spigot	spigot
spill	spill
spilling	spill
spills	spill
spilt	spilt
spilth	spilth
spin	spin
spinii	spinii
spinners	spinner
spinster	spinster
spinsters	spinster
spire	spire
spirit	spirit
spirited	spirit
spiritless	spiritless

spirits	spirit
spiritual	spiritu
spirituality	spiritualti
spirt	spirt
spit	spit
spital	spital
spite	spite
spited	spite
spiteful	
spite	
spites	spite
spits	spit
spitted	spit
spitting	spit
splay	splai
spleen	spleen
spleenful	spleen
spleens	spleen
spleeny	spleeni
splendour	splendour
splenitive	splenit
splinter	splinter
splinters	splinter
split	split
splits	split
splitted	split
splitting	split
spoil	spoil
spoils	spoil
spok	spok
spoke	spoke
spoken	spoken
spokes	spoke
spokesman	spokesman
sponge	spong
spongy	spongi
spoon	spoon
spoons	spoon
sport	sport
sportful	sport
sporting	sport
sportive	sportiv
sports	sport
spot	spot
spotless	spotless
spots	spot
spotted	spot
spousal	spousal

spouse	spous
spout	spout
spouting	spout
spouts	spout
sprag	sprag
sprang	sprang
sprat	sprat
sprawl	sprawl
spray	sprai
sprays	sprai
spread	spread
spreading	spread
spreads	spread
sprighted	spright
sprightful	spright
sprightly	sprightli
sprigs	sprig
spring	spring
springe	spring
springes	spring
springeth	springeth
springhalt	springhalt
springing	spring
springs	spring
springtime	
springtim	
sprinkle	sprinkl
sprinkles	sprinkl
sprite	sprite
sprited	sprite
spritely	sprite
sprites	sprite
spriting	sprite
sprout	sprout
spruce	spruce
sprung	sprung
spun	spun
spur	spur
spurio	spurio
spurn	spurn
spurns	spurn
spurr	spurr
spurrer	spurrer
spurring	spur
spurs	spur
spy	spy
spying	spy
squabble	squabbl

squadron	squadron
squadrons	squadron
squand	squand
squar	squar
square	squar
squarer	squarer
squares	squar
squash	squash
squeak	
squeak	
squeaking	squeak
squeal	squeal
squealing	squeal
squeezes	squeez
squeezing	squeez
squele	squel
squier	squier
squints	squint
squiny	squini
squire	squir
squires	squir
squirrel	squirrel
st	st
stab	stab
stabb	stabb
stabbed	stab
stabbing	stab
stable	stabl
stableness	stabl
stables	stabl
stablish	stablish
stablishment	stablish
stabs	stab
stacks	stack
staff	staff
stafford	stafford
staffords	stafford
staffordshire	staffordshir
stag	stag
stage	stage
stages	stage
stagger	
	stagger
staggering	stagger
staggers	stagger
stags	stag
staid	staid
staider	staider

stain	stain
stained	stain
staines	stain
staineth	staineth
staining	stain
stainless	stainless
stains	stain
stair	stair
stairs	stair
stake	stake
stakes	stake
stale	stale
staled	stale
stalk	stalk
stalking	stalk
stalks	stalk
stall	stall
stalling	stall
stalls	stall
stamford	stamford
stammer	stammer
stamp	stamp
stamped	stamp
stamps	stamp
stanch	stanch
stanchless	stanchless
stand	stand
standard	standard
standards	standard
stander	stander
standers	stander
standest	standest
standeth	standeth
standing	stand
stands	stand
staniel	staniel
stanley	stanlei
stanze	stanz
stanzo	stanzo
stanzos	stanzo
staple	stapl
staples	stapl
star	star
stare	stare
stared	stare
stares	stare
staring	stare
starings	stare

stark	stark
starkly	starkli
starlight	starlight
starling	starl
starr	starr
starry	starri
stars	star
start	start
started	start
starting	start
startingly	startingly
startle	startl
startles	startl
starts	start
starv	starv
starve	starv
starved	starv
starvelackey	starvelackei
starveling	starvel
starveth	starveth
starving	starv
state	state
statelier	stateli
stately	state
states	state
statesman	statesman
statesmen	statesmen
statilius	statiliu
station	station
statist	statist
statists	statist
statue	statu
statues	statu
stature	statur
statures	statur
statute	statut
statutes	statut
stave	stave
staves	stave
stay	stai
stayed	stai
stayest	stayest
staying	stai
stays	stai
stead	stead
steaded	stead
steadfast	steadfast

steadier	steadier
steads	stead
steal	steal
stealer	stealer
stealers	stealer
stealing	steal
steals	steal
stealth	stealth
stealthy	stealthi
steed	steed
steeds	steed
steel	steel
steeled	steel
steely	steeli
steep	steep
steeped	steep
steeple	steep
steepled	steep
steeps	steep
steepy	steepi
steer	steer
steerage	steerag
steering	steer
steers	steer
stelled	
stell	
stem	stem
stemming	stem
stench	stench
step	step
stepdame	stepdam
stephano	stephano
stephen	stephen
stepmothers	stepmoth
stepp	stepp
stepping	step
steps	step
sterile	steril
sterility	steril
sterling	sterl
stern	stern
sternage	sternag
sterner	sterner
sternest	sternest
sternness	stern
steterat	steterat
stew	stew
steward	steward

stewards	steward
stewardship	stewardship
stewed	stew
stews	stew
stick	stick
sticking	stick
stickler	stickler
sticks	stick
stiff	stiff
stiffen	stiffen
stiffly	stiffli
stifle	stifl
stifled	stifl
stifles	stifl
stigmatic	stigmat
stigmatical	stigmat
stile	stile
still	still
stiller	stiller
stillest	stillest
stillness	still
stilly	stilli
sting	sting
stinging	sting
stingless	stingless
stings	sting
stink	stink
stinking	stink
stinkingly	stinkingli
stinks	stink
stint	stint
stinted	stint
stints	stint
stir	stir
stirr	stirr
stirred	stir
stirrer	stirrer
stirrers	stirrer
stirreth	stirreth
stirring	stir
stirrup	
	stirrup
stirrups	stirrup
stirs	stir
stitchery	stitcheri
stitches	stitch
stithied	stithi
stithy	stithi

stoccadoes	stoccado
stoccata	stoccata
stock	stock
stockfish	stockfish
stocking	stock
stockings	stock
stockish	stockish
stocks	stock
stog	stog
stogs	stog
stoics	stoic
stokesly	stokesli
stol	stol
stole	stole
stolen	stolen
stolest	stolest
stomach	stomach
stomachers	stomach
stomaching	stomach
stomachs	stomach
ston	ston
stone	stone
stonecutter	stonecutt
stones	stone
stonish	
stonish	
stony	stoni
stood	stood
stool	stool
stools	stool
stoop	stoop
stooping	stoop
stoops	stoop
stop	stop
stope	stope
stopp	stopp
stopped	stop
stopping	stop
stops	stop
stor	stor
store	store
storehouse	storehous
storehouses	storehous
stores	store
stories	stori
storm	storm
stormed	storm
storming	storm

storms	storm
stormy	stormi
story	stori
stoup	stoup
stoups	stoup
stout	stout
stouter	stouter
stoutly	stoutli
stoutness	stout
stover	
	stover
stow	stow
stowage	stowag
stowed	stow
strachy	strachi
stragglers	straggler
straggling	straggl
straight	straight
straightest	straightest
straightway	straightwai
strain	strain
strained	strain
straining	strain
strains	strain
strait	strait
straited	strait
straiter	straiter
straitly	straitli
straitness	strait
straits	strait
strand	strand
strange	strang
strangely	strang
strangeness	strang
stranger	stranger
strangers	stranger
strangest	strangest
strangle	strangl
strangled	strangl
strangler	strangler
strangles	
strangl	
strangling	strangl
strappado	strappado
straps	strap
stratagem	stratagem
stratagems	stratagem
stratford	stratford

strato	strato
straw	straw
strawberries	strawberri
strawberry	strawberri
straws	straw
strawy	strawi
stray	strai
straying	strai
strays	strai
streak	streak
streaks	streak
stream	stream
streamers	streamer
streaming	stream
streams	stream
stretching	strech
street	street
streets	street
strength	strength
strengthen	strengthen
strengthened	strengthen
strengthless	strengthless
strengths	strength
stretch	stretch
stretched	stretch
stretches	stretch
stretching	stretch
strew	strew
strewing	strew
strewings	strew
strewments	strewment
stricken	stricken
strict	strict
stricter	stricter
strictest	strictest
strictly	strictli
stricture	stricture
stride	stride
strides	stride
striding	stride
strife	strife
strifes	strife
strik	strik
strike	strike
strikers	striker
strikes	strike
strikest	strikest
striking	strike

string	string
stringless	stringless
strings	string
strip	strip
stripes	stripe
stripling	stripl
striplings	
stripl	
stripp	stripp
stripping	strip
striv	striv
strive	strive
strives	strive
striving	strive
strok	strok
stroke	stroke
strokes	stroke
strond	strond
stronds	strond
strong	strong
stronger	stronger
strongest	strongest
strongly	strongli
strooke	strook
strossers	strosser
strove	strove
strown	strown
stroy	stroi
struck	struck
strucken	strucken
struggle	struggl
struggles	struggl
struggling	struggl
strumpet	strumpet
strumpeted	strumpet
strumpets	strumpet
strung	strung
strut	strut
struts	
strut	
strutted	strut
strutting	strut
stubble	stubble
stubborn	stubborn
stubbornest	stubbornest
stubbornly	stubbornli
stubbornness	stubborn
stuck	stuck

studded	stud
student	student
students	student
studied	studi
studies	studi
studious	studiou
studiously	studious
studs	stud
study	studi
studying	studi
stuff	stuff
stuffing	stuf
stuffs	stuff
stumble	stumbl
stumbled	stumbl
stumblest	stumblest
stumbling	stumbl
stump	stump
stumps	stump
stung	stung
stupefy	stupefi
stupid	stupid
stupified	
stupifi	
stuprum	stuprum
sturdy	sturdi
sty	sty
styga	styga
stygian	stygian
styl	styl
style	style
styx	styx
su	su
sub	sub
subcontracted	subcontract
subdu	subdu
subdue	subdu
subdued	subdu
subduements	subduement
subdues	subdu
subduing	subdu
subject	subject
subjected	subject
subjection	subject
subjects	subject
submerg	submerg
submission	submit
submissive	submit

submit	submit
submits	submit
submitting	submit
suborn	suborn
subornation	suborn
suborned	suborn
subscrib	
subscrib	
subscribe	subscrib
subscribed	subscrib
subscribes	subscrib
subscription	subscript
subsequent	subsequ
subsidies	subsidi
subsidy	subsidi
subsist	subsist
subsisting	subsist
substance	substanc
substances	substanc
substantial	substanti
substitute	substitut
substituted	substitut
substitutes	substitut
substitution	substitut
subtile	subtil
subtilly	subtilli
subtle	subtl
subtleties	subtleti
subtlety	subtleti
subtly	subtli
subtractors	subtractor
suburbs	suburb
subversion	subvers
subverts	subvert
succedant	succeed
succeed	suce
succeeded	succeed
succeeders	
succeed	
succeeding	succeed
succeeds	suce
success	success
successantly	successantli
successes	success
successful	success
successfully	successfulli
succession	success
successive	success

successively	success
successor	successor
successors	successor
succour	succour
succours	succour
such	such
suck	suck
sucker	sucker
suckers	sucker
sucking	suck
suckle	suckl
sucks	suck
sudden	sudden
suddenly	suddenli
sue	sue
sued	su
suerly	suerli
sues	sue
sueth	sueth
suff	suff
suffer	suffer
sufferance	
suffer	
sufferances	suffer
suffered	suffer
suffering	suffer
suffers	suffer
suffic	suffic
suffice	suffic
sufficed	suffic
suffices	suffic
sufficeth	sufficeth
sufficiency	suffici
sufficient	suffici
sufficiently	suffici
sufficing	suffic
sufficit	sufficit
suffigance	suffig
suffocate	suffoc
suffocating	suffoc
suffocation	suffoc
suffolk	suffolk
suffrage	suffrag
suffrages	suffrag
sug	sug
sugar	sugar
sugarsop	sugarsop
suggest	suggest

suggested	suggest
suggesting	suggest
suggestion	suggest
suggestions	suggest
suggests	suggest
suis	
sui	
suit	suit
suitable	suitabl
suited	suit
suiting	suit
sutor	sutor
suitors	sutor
suits	suit
suivez	suivez
sullen	sullen
sullens	sullen
sullied	sulli
sullies	sulli
sully	sulli
sulph	sulph
sulphurous	sulpher
sulphur	sulphur
sulphurous	sulphur
sultan	sultan
sultry	sultri
sum	sum
sumless	sumless
summ	summ
summa	summa
summary	summari
summer	summer
summers	summer
summit	summit
summon	summon
summoners	summon
summons	summon
sumpter	sumpter
sumptuous	sumptuou
sumptuously	sumptuous
sums	sum
sun	sun
sunbeams	sunbeam
sunburning	sunburn
sunburnt	sunburnt
sund	sund
sunday	sundai
sundays	sundai

sunder	sunder
sunders	sunder
sundry	sundri
sung	sung
sunk	sunk
sunken	sunken
sunny	sunni
sunrising	sunris
suns	sun
sunset	sunset
sunshine	sunshin
sup	sup
super	super
superficial	superfici
superficially	superfici
superfluity	superflu
superfluous	superflu
superfluously	superflu
superflux	superflux
superior	superior
supernal	supern
supernatural	supernatur
superpraise	superprais
superscript	superscript
superscription	superscript
superserviceable	superservic
superstition	superstit
superstitious	superstiti
superstitiously	superstiti
supersubtle	supersubtl
supervise	supervis
supervisor	supervisor
supp	supp
supper	supper
suppers	supper
suppertime	suppertim
supping	sup
supplant	supplant
supple	suppl
suppler	suppler
suppliance	supplianc
suppliant	suppliant
suppliants	suppliant
supplicant	supplic
supplication	supplic
supplications	supplic
supplie	suppli
supplied	suppli

supplies	suppli
suppliest	suppliest
supply	
suppli	
supplyant	supplyant
supplying	suppli
supplyment	supplyment
support	support
supportable	support
supportance	support
supported	support
supporter	support
supporters	support
supporting	support
supportor	supportor
suppos	suppo
supposal	suppos
suppose	suppos
supposed	suppos
supposes	suppos
supposest	supposest
supposing	suppos
supposition	supposit
suppress	suppress
suppressed	suppress
suppresseth	suppresseth
supremacy	supremaci
supreme	suprem
sups	sup
sur	sur
surance	suranc
surcease	surceas
surd	surd
sure	sure
surecard	surecard
surely	sure
surer	surer
surest	surest
sureties	sureti
surety	sureti
surfeit	surfeit
surfeited	surfeit
surfeiter	surfeit
surfeiting	surfeit
surfeits	surfeit
surge	surg
surgeon	surgeon
surgeons	surgeon

surgere	surger
surgery	surgeri
surges	surg
surly	surli
surmis	surmi
surmise	surmis
surmised	surmis
surmises	surmis
surmount	surmount
surmounted	surmount
surmounts	surmount
surnam	surnam
surname	surnam
surnamed	surnam
surpasseth	surpasseth
surpassing	surpass
surplice	surplic
surplus	surplu
surpris	surpri
surprise	surpris
surprised	surpris
surrender	surrend
surrey	surrei
surreys	surrei
survey	survei
surveyest	surveyest
surveying	survei
surveyor	surveyor
surveyors	surveyor
surveys	survei
survive	surviv
survives	surviv
survivor	survivor
susan	susan
suspect	suspect
suspected	suspect
suspecting	suspect
suspects	suspect
suspend	suspend
suspense	suspens
suspicion	suspicion
suspicious	suspicion
suspicious	suspici
suspuration	suspir
suspire	suspir
sust	sust
sustain	sustain
sustaining	

sustain	
sutler	sutler
sutton	sutton
suum	suum
swabber	swabber
swaddling	swaddl
swag	swag
swagg	swagg
swagger	swagger
swaggerer	swagger
swaggerers	swagger
swaggering	swagger
swain	swain
swains	swain
swallow	swallow
swallowed	swallow
swallowing	swallow
swallows	swallow
swam	swam
swan	swan
swans	swan
sword	sword
sware	sware
swarm	swarm
swarming	swarm
swart	swart
swarth	swarth
swarths	swarth
swarthy	swarhi
swashers	swasher
swashing	swash
swath	
swath	
swathing	swath
swathling	swathl
sway	swai
swaying	swai
sways	swai
swear	swear
swearer	swearer
swearers	swearer
swearst	swearst
swearing	swear
swearings	swear
swears	swear
sweat	sweat
sweaten	sweaten
sweating	sweat

sweats	sweat
sweaty	sweati
sweep	sweep
sweepers	sweeper
sweeps	sweep
sweet	sweet
sweeten	sweeten
sweetens	sweeten
sweeter	sweeter
sweetest	sweetest
sweetheart	sweetheart
sweeting	sweet
sweetly	sweetli
sweetmeats	sweetmeat
sweetness	sweet
sweets	sweet

swell	swell
swelling	swell
swellings	swell
swells	swell
swelter	swelter
sweno	sweno
swept	swept
swerve	swerv
swerver	swerver
swerving	swerv
swift	swift
swifter	swifter
swiftest	swiftest
swiftly	swiftli
swiftness	swift
swill	swill
swills	swill
swim	swim
swimmer	swimmer
swimmers	swimmer
swimming	swim
swims	swim
swine	swine
swineherds	swineherd
swing	swing
swinge	swing
swinish	swinish
swinstead	swinstead
switches	switch
swits	swit
switzers	switzer

swol	
swol	swol
swoll	swoll
swoln	swoln
swoon	swoon
swooned	swoon
swooning	swoon
swoons	swoon
swoop	swoop
swoopstake	swoopstak
swor	swor
sword	sword
sworder	sworder
swords	sword
swore	swore
sworn	sworn
swounded	swound
swounds	swound
swum	swum
swung	swung
sy	sy
sycamore	sycamor
sycorax	sycorax
sylla	sylla
syllable	syllabl
syllables	syllabl
syllogism	syllog
symbols	symbol
sympathise	sympathis
sympathiz	sympathiz
sympathize	sympath
sympathized	sympath
sympathy	sympathi
synagogue	synagogu
synod	synod
synods	synod
syracuse	syracus
syracusian	syracusian
syracusians	syracusian
syria	syria
syrups	syrup
t	t
ta	ta
taber	taber
table	tabl
tabled	tabl
tables	tabl
tablet	tablet

tabor	tabor
taborer	tabor
tabors	tabor
tabourines	tabourin
taciturnity	taciturn
tack	tack
tackle	tackl
tackled	tackl
tackles	tackl
tackling	tackl
tacklings	tackl
taddle	taddl
tadpole	tadpol
taffeta	taffeta
taffety	taffeti
tag	tag
tagrag	
tagrag	
tah	tah
tail	tail
tailor	tailor
tailors	tailor
tails	tail
taint	taint
tainted	taint
tainting	taint
taints	taint
tainture	taintur
tak	tak
take	take
taken	taken
taker	taker
takes	take
takest	takest
taketh	taketh
taking	take
tal	tal
talbot	talbot
talbotites	talbotit
talbots	talbot
tale	tale
talent	talent
talents	talent
taleporter	taleport
tales	tale
talk	talk
talked	talk
talker	talker

talkers	talker
talkest	talkest
talking	talk
talks	talk
tall	tall
taller	taller
tallest	tallest
tallies	talli
tallow	tallow
tally	talli
talons	talon
tam	tam
tambourines	tambourin
tame	tame
tamed	tame
tamely	tame
tameness	tame
tamer	tamer
tames	tame
taming	tame
tamora	tamora
tamworth	tamworth
tan	tan
tang	tang
tangle	tangl
tangled	tangl
tank	tank
tanlings	tanl
tann	tann
tanned	tan
tanner	tanner
tanquam	tanquam
tanta	tanta
tantaene	tantaen
tap	
	tap
tape	tape
taper	taper
tapers	taper
tapestries	tapestri
tapestry	tapestri
taphouse	taphous
tapp	tapp
tapster	tapster
tapsters	tapster
tar	tar
tardied	tardi
tardily	tardili

tardiness	tardi
tardy	tardi
tarentum	tarentum
targe	targ
targes	targ
target	target
targets	target
tarpeian	tarpeian
tarquin	tarquin
tarquins	tarquin
tarr	tarr
tarre	tarr
tarriance	tarrianc
tarried	tarri
tarries	tarri
tarry	tarri
tarrying	tarri
tart	tart
tartar	tartar
tartars	tartar
tartly	tartli
tartness	tart
task	task
tasker	tasker
tasking	task
tasks	task
tassel	tassel
taste	tast
tasted	tast
tastes	tast
tasting	tast
tatt	tatt
tatter	tatter
tattered	tatter
tatters	tatter
tattle	tattl
tattling	tattl
tattlings	tattl
taught	taught
taunt	taunt
taunted	taunt
taunting	taunt
tauntingly	tauntingli
taunts	taunt
taurus	tauru
tavern	tavern
taverns	tavern
tavy	tavi

tawdry	tawdri
tawny	tawni
tax	tax
taxation	taxat
taxations	taxat
taxes	tax
taxing	tax
tc	tc
te	te
teach	teach
teacher	teacher
teachers	teacher
teaches	teach
teachest	teachest
teacheth	teacheth
teaching	teach
team	team
tear	tear
tearful	tear
tearing	tear
tears	tear
tearsheet	tearsheet
teat	teat
tedious	tediou
tediously	tedious
tediousness	tedious
teem	teem
teeming	teem
teems	teem
teen	teen
teeth	teeth
teipsum	teipsum
telamon	telamon
telamoni	telamoni
tell	tell
teller	teller
telling	tell
tells	tell
tellus	tellu
temp	temp
temper	temper
temperality	temper
temperance	temper
temperate	temper
temperately	temper
tempers	temper
tempest	tempest
tempests	tempest

tempestuous	tempestu
temple	templ
temples	templ
temporal	tempor
temporary	temporari
temporiz	temporiz
temporize	tempor
temporizer	tempor
temps	temp
tempt	tempt
temptation	temptat
temptations	temptat
tempted	tempt
tempter	tempter
tempters	tempter
tempteth	tempteth
tempting	tempt
tempts	tempt
ten	
	ten
tenable	tenabl
tenant	tenant
tenantius	tenantiu
tenantless	tenantless
tenants	tenant
tench	tench
tend	tend
tendance	tendanc
tended	tend
tender	tender
tendered	tender
tenderly	tenderli
tenderness	tender
tenders	tender
tending	tend
tends	tend
tenedos	tenedo
tenement	tenement
tenements	tenement
tenfold	tenfold
tennis	tenni
tenour	tenour
tenours	tenour
tens	ten
tent	tent
tented	tent
tenth	tenth
tenths	tenth

tents	tent
tenure	tenur
tenures	tenur
tercel	tercel
tereus	tereu
term	term
termagant	termag
termed	term
terminations	termin
termless	termless
terms	term
terra	terra
terrace	terrac
terram	terram
terras	terra
terre	terr
terrene	terren
terrestrial	terrestri
terrible	terribl
terribly	terribl
territories	territori
territory	territori
terror	terror
terrors	terror
tertian	tertian
tertio	tertio
test	test
testament	testament
tested	test
tester	tester
testern	testern
testify	testifi
testimonied	testimoni
testimonies	testimoni
testimony	testimoni
testiness	testi
testril	testril
testy	testi
tetchy	tetchi
tether	tether
tetter	tetter
tevil	tevil
tewksbury	tewksburi
text	text
tgV	tgV
th	th
thaes	thae
thames	thame

than	than
thane	thane
thanes	thane
thank	thank
thanked	thank
thankful	thank
thankfully	thankfulli
thankfulness	thank
thanking	thank
thankings	thank
thankless	thankless
thanks	thank
thanksgiving	thanksgiv
thasos	thaso
that	that
thatch	thatch
thaw	thaw
thawing	
thaw	
thaws	thaw
the	the
theatre	theatr
theban	theban
thebes	thebe
thee	thee
theft	theft
thefts	theft
thein	thein
their	their
theirs	their
theise	theis
them	them
theme	theme
themes	theme
themselves	themselv
then	then
thence	thenc
thenceforth	thenceforth
theoric	theoric
there	there
thereabout	thereabout
thereabouts	thereabout
thereafter	thereaft
thereat	thereat
thereby	therebi
therefore	therefor
therein	therein
thereof	thereof

thereon	thereon
thereto	
thereto	
thereunto	thereunto
thereupon	thereupon
therewith	therewith
therewithal	therewith
thersites	thersit
these	these
theseus	theseu
thessalian	thessalian
thessaly	thessali
thetis	theti
thews	thew
they	thei
thick	thick
thicken	thicken
thickens	thicken
thicker	thicker
thickest	thickest
thicket	thicket
thickskin	thickskin
thief	thief
thievery	thieveri
thieves	thiev
thievish	thievish
thigh	thigh
thighs	thigh
thimble	thimbl
thimbles	thimbl
thin	thin
thine	thine
thing	thing
things	
thing	
think	think
thinkest	thinkest
thinking	think
thinkings	think
thinks	think
thinkst	thinkst
thinly	thinli
third	third
thirdly	thirdli
thirds	third
thirst	thirst
thirsting	thirst
thirsts	thirst

thirsty	thirsti
thirteen	thirteen
thirties	thirti
thirtieth	thirtieth
thirty	thirti
this	thi
thisby	thisbi
thisne	thisn
thistle	thistl
thistles	thistl
thither	thither
thitherward	thitherward
thoas	thoa
thomas	thoma
thorn	thorn
thorns	thorn
thorny	thorni
thorough	
thorough	
thoroughly	thoroughli
those	those
thou	thou
though	though
thought	thought
thoughtful	thought
thoughts	thought
thousand	thousand
thousands	thousand
thracian	thracian
thraldom	thraldom
thrall	thrall
thralled	thrall
thralls	thrall
thrash	thrash
thrasonical	thrason
thread	thread
threadbare	threadbar
threaden	threaden
threading	thread
threat	threat
threaten	threaten
threatening	threaten
threatens	threaten
threatest	threatest
threats	threat
three	three
threefold	threefold
threepence	threepenc

threepile	threepil
threes	three
threescore	threescor
thresher	thresher
threshold	threshold
threw	threw
thrice	thrice
thrift	thrift
thriftless	thriftless
thrifths	thrift
thrifty	thriffti
thrill	thrill
thrilling	thrill
thrills	thrill
thrive	thrive
thrived	thrive
thrivers	thrivers
thrives	thrive
thriving	thrive
throat	throat
throats	throat
throbbing	throbb
throbs	throbb
throca	throca
throe	throe
throes	throe
thromuldo	thromuldo
thron	thron
throne	throne
throned	throne
thrones	throne
throng	
throng	
thronging	throng
throng	throng
throng	throng
throstle	throstl
throttle	throttl
through	through
throughfare	throughfar
throughfares	throughfar
throughly	throughli
throughout	throughout
throw	throw
thrower	thrower
throwest	throwest
throwing	throw
thrown	thrown
throws	throw

thrum	thrum
thrumm	thrumm
thrush	thrush
thrust	thrust
thrusteth	thrusteth
thrusting	thrust
thrusts	thrust
thumb	thumb
thumbs	thumb
thump	thump
thund	thund
thunder	thunder
thunderbolt	thunderbolt
thunderbolts	thunderbolt
thunderer	thunder
thunders	thunder
thunderstone	thunderston
thunderstroke	thunderstrok
thurio	thurio
thursday	thursdai
thus	thu
thwack	thwack
thwart	thwart
thwarted	thwart
thwarting	thwart
thwartings	thwart
thy	thy
thyme	thyme
thymus	thymu
thyreus	thyreu
thysself	thysself
ti	ti
tib	tib
tiber	tiber
tiberio	tiberio
tibey	tibei
ticed	tice
tick	tick
tickl	tickl
tickle	tickl
tickled	tickl
tickles	tickl
tickling	tickl
ticklish	ticklish
tiddle	tiddl
tide	tide
tides	

tide	
tidings	tide
tidy	tidi
tie	tie
tied	ti
ties	ti
tiff	tiff
tiger	tiger
tigers	tiger
tight	tight
tightly	tightli
tike	tike
til	til
tile	tile
till	till
tillage	tillag
tilly	tilli
tilt	tilt
tilter	tilter
tilth	tilth
tilting	tilt
tilts	tilt
tiltyard	tiltyard
tim	tim
timandra	timandra
timber	timber
time	time
timeless	timeless
timelier	timeli
timely	time
times	time
timon	timon
timor	timor
timorous	
timor	
timorously	timor
tinct	tinct
tincture	tinctur
tinctures	tinctur
tinder	tinder
tingling	tingl
tinker	tinker
tinkers	tinker
tinsel	tinsel
tiny	tini
tip	tip
tipp	tipp
tippling	tippl

tips	tip
tipsy	tipsi
tiptoe	tipto
tir	tir
tire	tire
tired	tire
tires	tire
tirest	tirest
tiring	tire
tirra	tirra
tirrits	tirrit
tis	ti
tish	tish
tisick	tisick
tissue	tissu
titan	titan
titania	titania
tithe	tith
tithed	
tith	
tithing	tith
titinius	titiniu
title	titl
titled	titl
titleless	titleless
titles	titl
tittle	tittl
tittles	tittl
titular	titular
titus	titu
tn	tn
to	to
toad	toad
toads	toad
toadstool	toadstool
toast	toast
toasted	toast
toasting	toast
toasts	toast
toaze	toaz
toby	tobi
tock	tock
tod	tod
today	todai
todpole	todpol
tods	tod
toe	toe
toes	toe

tofore	tofor
toge	toge
toged	toge
together	togeth
toil	
toil	
toiled	toil
toiling	toil
toils	toil
token	token
tokens	token
told	told
toledo	toledo
tolerable	toler
toll	toll
tolling	toll
tom	tom
tomb	tomb
tombe	tomb
tomed	tomb
tombless	tombless
tomboys	tomboi
tombs	tomb
tomorrow	tomorrow
tomyris	tomyri
ton	ton
tongs	tong
tongu	tongu
tongue	tongu
tongued	tongu
tongueless	tongueless
tongues	tongu
tonight	tonight
too	too
took	took
tool	tool
tools	tool
tooth	
tooth	
toothache	toothach
toothpick	toothpick
toothpicker	toothpick
top	top
topas	topa
topful	top
topgallant	topgal
topless	topless
topmast	topmast

topp	topp
topping	top
topple	toppl
topples	toppl
tops	top
topsail	topsail
topsy	topsi
torch	torch
torchbearer	torchbear
torchbearers	torchbear
torcher	torcher
torches	torch
torchlight	torchlight
tore	tore
torment	torment
tormenta	tormenta
tormente	torment
tormented	torment
tormenting	torment
tormentors	tormentor
torments	torment
torn	
torn	
torrent	torrent
tortive	tortiv
tortoise	tortois
tortur	tortur
torture	tortur
tortured	tortur
torturer	tortur
torturers	tortur
tortures	tortur
torturest	torturest
torturing	tortur
toryne	toryn
toss	toss
tossed	toss
tosseth	tosseth
tossing	toss
tot	tot
total	total
totally	total
tott	tott
tattered	totter
totters	totter
tou	tou
touch	touch
touched	touch

touches	touch
toucheth	toucheth
touching	touch
touchstone	touchston
tough	tough
tougher	tougher
toughness	
tough	
touraine	tourain
tournaments	tournament
tours	tour
tous	tu
tout	tout
touze	touz
tow	tow
toward	toward
towardly	towardli
towards	toward
tower	tower
towering	tower
towers	tower
town	town
towns	town
township	township
townsman	townsman
townsmen	townsmen
towton	towton
toy	toi
toys	toi
trace	trace
traces	trace
track	track
tract	tract
tractable	tractabl
trade	trade
traded	trade
traders	trader
trades	trade
tradesman	tradesman
tradesmen	tradesmen
trading	trade
tradition	tradi
traditional	tradi
traduc	traduc
traduced	traduc
traducement	traduc
traffic	traffic

traffickers	traffick
traffics	traffic
tragedian	tragedian
tragedians	tragedian
tragedies	tragedi
tragedy	tragedi
tragic	tragic
tragical	tragic
trail	trail
train	train
trained	train
training	train
trains	train
trait	trait
traitor	traitor
traitorly	traitorli
traitorous	traitor
traitorously	traitor
traitors	traitor
traitress	traitress
traject	traject
trammel	trammel
trample	
trampl	
trampled	trampl
trampling	trampl
tranc	tranc
trance	tranc
tranio	tranio
tranquil	tranquil
tranquillity	tranquil
transcendence	transcend
transcends	transcend
transferred	transfer
transfigur	transfigur
transfix	transfix
transform	transform
transformation	transform
transformations	transform
transformed	transform
transgress	transgress
transgresses	transgress
transgressing	transgress
transgression	transgress
translate	translat
translated	translat
translates	translat
translation	translat

transmigrates	transmigr
transmutation	transmut
transparent	transpar
transport	transport
transportance	transport
transported	transport
transporting	transport
transports	transport
transpose	transpos
transshape	transshap
trap	trap
trapp	trapp
trappings	trap
traps	trap
trash	trash
travail	travail
travails	travail
travel	travel
traveler	travel
traveling	travel
travell	travel
travelled	travel
traveller	travel
travellers	travel
travellest	travellest
travelling	travel
travels	travel
travers	traver
traverse	travers
tray	trai
treacherous	treacher
treacherously	treacher
treachers	treacher
treachery	treacheri
tread	tread
treading	
tread	
treads	tread
treason	treason
treasonable	treason
treasonous	treason
treasons	treason
treasure	treasur
treasurer	treasur
treasures	treasur
treasuries	treasuri
treasury	treasuri
treat	treat

treaties	treati
treatise	treatis
treats	treat
treaty	treati
treble	trebl
trebled	trebl
trebles	trebl
trebonius	treboniu
tree	tree
trees	tree
tremble	trembl
trembled	trembl
trembles	trembl
tremblest	tremblest
trembling	trembl
tremblingly	tremblingli
tremor	tremor
trempling	trempl
trench	trench
trenchant	
trenchant	
trenched	trench
trencher	trencher
trenchering	trencher
trencherman	trencherman
trenchers	trencher
trenches	trench
trenching	trench
trent	trent
tres	tre
trespass	trespass
trespasses	trespass
tressel	tressel
tresses	tress
treys	trei
trial	trial
trials	trial
trib	trib
tribe	tribe
tribes	tribe
tribulation	tribul
tribunal	tribun
tribune	tribun
tribunes	tribun
tributaries	tributari
tributary	tributari
tribute	tribut
tributes	tribut

trice	trice
trick	trick
tricking	trick
trickling	
trickl	
tricks	trick
tricksy	tricksi
trident	trident
tried	tri
trier	trier
trifle	trifl
trifled	trifl
trifler	trifler
trifles	trifl
trifling	trifl
trigon	trigon
trill	trill
trim	trim
trimly	trimli
trimm	trimm
trimmed	trim
trimming	trim
trims	trim
trinculo	trinculo
trinculos	trinculo
trinkets	trinket
trip	trip
tripartite	tripartit
tripe	tripe
triple	tripl
triplex	triplex
tripoli	tripoli
tripolis	tripoli
tripp	tripp
tripping	trip
trippingly	trippingli
trips	trip
tristful	trist
triton	triton
triumph	triumph
triumphant	triumphant
triumphantly	triumphantli
triumpher	triumpher
triumphers	triumpher
triumphing	triumph
triumphs	triumph
triumvir	triumvir
triumvirate	triumvir

triumvirs	triumvir
triumviry	triumviri
trivial	trivial
troat	troat
trod	trod
trodden	trodden
troiant	troiant
troien	troien
troilus	troilu
troiluses	troilus
trojan	trojan
trojans	trojan
troll	troll
tromperies	tromperi
trompet	trompet
troop	troop
trooping	troop
troops	troop
trop	
trop	
trophies	trophi
trophy	trophi
tropically	tropic
trot	trot
troth	troth
trothed	troth
troths	troth
trots	trot
trotting	trot
trouble	troubl
troubled	troubl
troubler	troubler
troubles	troubl
troublesome	troublesom
troublest	troublest
troublous	troublou
trough	trough
trout	trout
trouts	trout
trovato	trovato
trow	trow
trowel	trowel
trowest	trowest
troy	troi
troyan	troyan
troyans	troyan
truant	truant
truce	truce

truckle	truckl
trudge	trudg
true	true
trueborn	trueborn
truepenny	truepenni
truer	truer
truest	truest
truie	truie
trull	trull
trulls	trull
truly	truli
trump	trump
trumpery	trumperi
trumpet	trumpet
trumpeter	trumpet
trumpeters	trumpet
trumpets	trumpet
truncheon	truncheon
truncheoners	truncheon
trundle	trundl
trunk	trunk
trunks	trunk
trust	trust
trusted	trust
truster	truster
trusters	truster
trusting	trust
trusts	trust
trusty	trusti
truth	truth
truths	truth
try	try
ts	ts
tu	tu
tuae	
	tuae
tub	tub
tubal	tubal
tubs	tub
tuck	tuck
tucket	tucket
tuesday	tuesdai
tuft	tuft
tufts	tuft
tug	tug
tugg	tugg
tugging	tug
tuition	tuition

tullus	tullu
tully	tulli
tumble	tumbl
tumbled	tumbl
tumbler	tumbler
tumbling	tumbl
tumult	tumult
tumultuous	tumultu
tun	tun
tune	tune
tuneable	tuneabl
tuned	tune
tuners	tuner
tunes	tune
tunis	tuni
tuns	tun
tupping	tup
turban	turban
turbans	turban
turbulence	turbul
turbulent	turbul
turd	turd
turf	turf
turfy	turfi
turk	turk
turkey	turkei
turkeys	turkei
turkish	turkish
turks	turk
turlygod	turlygod
turmoil	turmoil
turmoiled	turmoil
turn	turn
turnbull	turnbul
turncoat	turncoat
turncoats	turncoat
turned	turn
turneth	turneth
turning	turn
turnips	turnip
turns	turn
turph	turph
turpitude	turpitud
turquoise	turquois
turret	turret
turrets	turret
turtle	turtl
turtles	turtl

turvy	turvi
tuscan	tuscan
tush	tush
tut	
	tut
tutor	tutor
tutored	tutor
tutors	tutor
tutto	tutto
twain	twain
twang	twang
twangling	twangl
twas	twa
tway	twai
tweaks	tweak
tween	tween
twelfth	twelfth
twelve	twelv
twelvemonth	twelvemonth
twentieth	twentieth
twenty	twenti
twere	twere
twice	twice
twig	twig
twiggen	twiggen
twigs	twig
twilight	twilight
twill	twill
twilld	twill
twin	twin
twine	twine
twink	twink
twinkle	twinkl
twinkled	twinkl
twinkling	twinkl
twinn	twinn
twins	
	twin
twire	twire
twist	twist
twisted	twist
twit	twit
twits	twit
twitting	twit
twixt	twixt
two	two
twofold	twofold
twopence	twopenc

twopences	twopenc
twos	two
twould	twould
tyb	tyb
tybalt	tybalt
tybalts	tybalt
tyburn	tyburn
tying	ty
tyke	tyke
tymbria	tymbria
type	type
types	type
typhon	typhon
tyrannical	tyrann
tyrannically	tyrann
tyrannize	tyrann
tyrannous	tyrann
tyranny	tyranni
tyrant	tyrant
tyrants	tyrant
tyrian	tyrian
tyrrel	
	tyrrel
u	u
ubique	ubiqu
udders	udder
udge	udg
uds	ud
uglier	uglier
ugliest	ugliest
ugly	ugli
ulcer	ulcer
ulcerous	ulcer
ulysses	ulyss
um	um
umber	umber
umbra	umbra
umbrage	umbrag
umfrevile	umfrevil
umpire	umpir
umpires	umpir
un	un
unable	unabl
unaccommodated	unaccommod
unaccompanied	unaccompani
unaccustom	unaccustom
unaching	unach
unacquainted	unacquaint

unactive	unact
unadvis	unadvi
unadvised	unadvis
unadvisedly	unadvisedli
unagreeable	unagre
unanel	
unanel	
unanswer	unansw
unappeas	unappea
unapproved	unapprov
unapt	unapt
unaptness	unapt
unarm	unarm
unarmed	unarm
unarms	unarm
unassail	unassail
unassailable	unassail
unattainted	unattaint
unattempted	unattempt
unattended	unattend
unauspicious	unauspici
unauthorized	unauthor
unavoided	unavoid
unawares	unawar
unback	unback
unbak	unbak
unbanded	unband
unbar	unbar
unbarb	unbarb
unbashful	unbash
unbated	unbat
unbatter	unbatt
unbecoming	unbecom
unbefitting	unbefit
unbegot	unbegot
unbegotten	unbegotten
unbelieved	unbeliev
unbend	
unbend	
unbent	unbent
unbewail	unbewail
unbid	unbid
unbidden	unbidden
unbind	unbind
unbinds	unbind
unbitted	unbit
unbless	unbless
unblest	unblest

unbloodied	unbloodi
unblown	unblown
unbodied	unbodi
unbolt	unbolt
unbolted	unbolt
unbonneted	unbonnet
unbookish	unbookish
unborn	unborn
unbosom	unbosom
unbound	unbound
unbounded	unbound
unbow	unbow
unbowed	unbow
unbrac	unbrac
unbraced	unbrac
unbraided	unbraid
unbreathed	unbreath
unbred	unbr
unbreech	unbreech
unbridled	unbridl
unbroke	unbrok

unbruis	unbrui
unbruised	unbruis
unbuckle	unbuckl
unbuckles	unbuckl
unbuckling	unbuckl
unbuild	unbuild
unburden	unburden
unburdens	unburden
unburied	unburi
unburnt	unburnt
unburthen	unburthen
unbutton	unbutton
unbuttoning	unbutton
uncapable	uncap
uncape	uncap
uncase	uncas
uncasing	uncas
uncaught	uncaught
uncertain	uncertain
uncertainty	uncertaini
unchain	unchain
unchanging	unchang
uncharge	uncharg
uncharged	uncharg
uncharitably	uncharit
unchary	unchari

unchaste	unchast
uncheck	uncheck
unchilded	unchild
uncivil	uncivil
unclaim	
unclaim	
unclasp	unclasp
uncle	uncl
unclean	unclean
uncleanliness	uncleanli
uncleanly	uncleanli
uncleanness	unclean
uncles	uncl
unclew	unclew
unclog	unclog
uncoined	uncoin
uncolted	uncolt
uncomeliness	uncomeli
uncomfortable	uncomfort
uncompassionate	uncompassion
uncomprehensive	uncomprehens
unconfinable	unconfin
unconfirm	unconfirm
unconfirmed	unconfirm
unconquer	unconqu
unconquered	unconqu
unconsidered	unconsid
unconstant	unconst
unconstrain	unconstrain
unconstrained	unconstrain
uncontemn	uncontemn
uncontroll	uncontrol
uncorrected	uncorrect
uncounted	uncount
uncouple	
uncoupl	
uncourteous	uncourt
uncouth	uncouth
uncover	uncov
uncovered	uncov
uncropped	uncrop
uncross	uncross
uncrown	uncrown
unction	unction
unctuous	unctuou
uncuckolded	uncuckold
uncurable	uncur
uncurbable	uncurb

uncurbed	uncurb
uncurls	uncurl
uncurrent	uncurr
uncurse	uncurs
undaunted	undaunt
undeaf	undeaf
undeck	undeck
undeeded	undeed
under	under
underbearing	underbear
underborne	underborn
undercrest	undercrest
underfoot	underfoot
undergo	undergo
undergoes	undergo
undergoing	undergo
undergone	undergon
underground	underground

underhand	underhand
underlings	underl
undermine	undermin
underminers	undermin
underneath	underneath
underprizing	underpr
underprop	underprop
understand	understand
understandeth	understandeth
understanding	understand
understandings	understand
understands	understand
understood	understood
underta	underta
undertake	undertak
undertakeing	undertak
undertaker	undertak
undertakes	undertak
undertaking	undertak
undertakings	undertak
undertook	undertook
undervalu	undervalu
undervalued	undervalu
underwent	underw
underwrit	underwrit
underwrite	underwrit
undescried	undescri
undeserved	undeserv
undeserver	undeserv

undeservers	undeserv
undeserving	undeserv
undetermin	undetermin
undid	undid
undinted	undint
undiscernible	undiscern
undiscover	undiscov
undishonoured	undishonour
undispos	undispo
undistinguishable	undistinguish
undistinguished	undistinguish
undividable	undivid
undivided	undivid
undivulged	undivulg
undo	undo
undoes	undo
undoing	undo
undone	undon
undoubted	undoubt
undoubtedly	undoubtedly
undream	undream
undress	undress
undressed	undress
undrown	undrown
unduteous	undut
undutiful	unduti
une	un
uneared	unear
unearned	unearn
unearthly	unearthli
uneasines	uneasin
uneasy	uneasi
uneath	uneath
uneducated	uneduc
uneffectual	uneffectu
unelected	unelect
unequal	unequ
uneven	uneven
unexamin	unexamin
unexecuted	unexecut
unexpected	unexpected
unexperienc	unexperienc
unexperient	unexperi
unexpressive	unexpress
unfair	unfair
unfaithful	unfaith
unfallible	unfal

unfam	unfam
unfashionable	unfashion
unfasten	unfasten
unfather	unfath
unfathered	unfath
unfed	unf
unfeed	unfe
unfeeling	unfeel
unfeigned	unfeign
unfeignedly	unfeignedli
unfellowed	unfellow
unfelt	unfelt
unfenced	unfenc
unfilial	
unfili	
unfill	unfil
unfinish	unfinish
unfirm	unfirm
unfit	unfit
unfitness	unfit
unfix	unfix
unfledg	unfledg
unfold	unfold
unfolded	unfold
unfoldeth	unfoldeth
unfolding	unfold
unfolds	unfold
unfool	unfool
unforc	unforc
unforced	unforc
unforfeited	unforfeit
unfortified	unfortifi
unfortunate	unfortun
unfought	unfought
unfrequented	unfrequ
unfriended	unfriend
unfurnish	unfurnish
ungain	ungain
ungalled	ungal
ungart	ungart
ungarter	ungart
ungenitur	ungenitur
ungentle	ungentl
ungentleness	ungentl
ungently	ungent
ungird	ungird
ungodly	ungodli
ungor	ungor

ungot	ungot
ungotten	ungotten
ungovern	ungovern
ungracious	ungraci
ungrateful	ungrat
ungravely	ungrav
ungrown	ungrown
unguarded	unguard
anguem	anguem
unguided	unguid
unhack	unhack
unhair	unhair
unhallow	unhallow
unhallowed	unhallow
unhand	unhand
unhandled	unhandl
unhandsome	unhandsom
unhang	unhang
unhappied	unhappi
unhappily	unhappili
unhappiness	unhappi
unhappy	unhappi
unhardened	unharden
unharm	unharm
unhatch	unhatch
unheard	unheard
unhearts	unheart
unheedful	
unheed	
unheedfully	unheedfulli
unheedy	unheedi
unhelpful	unhelp
unhidden	unhidden
unholy	unholi
unhop	unhop
unhopefullest	unhopefullest
unhorse	unhors
unhospitable	unhospit
unhous	unhou
unhoused	unhous
unhurtful	unhurt
unicorn	unicorn
unicorns	unicorn
unimproved	unimprov
uninhabitable	uninhabit
uninhabited	uninhabit
unintelligent	unintellig
union	union

unions	union
unite	unit
united	unit
unity	uniti
universal	univers
universe	univers
universities	univers
university	univers
unjointed	unjoint
unjust	unjust
unjustice	unjustic
unjustly	unjustli
unkennel	unkennel
unkept	unkept
unkind	unkind
unkindest	unkindest
unkindly	unkindli
unkindness	unkind
unking	unk
unkinglike	unkinglik
unkiss	unkiss
unknit	unknit
unknowing	unknow
unknown	unknown
unlace	unlac
unlaid	unlaid
unlawful	unlaw
unlawfully	unlawfulli
unlearn	unlearn
unlearned	unlearn
unless	unless
unlesson	unlesson
unletter	unlett
unlettered	unlett
unlick	unlick
unlike	unlik
unlikely	unlik
unlimited	unlimit
unlineal	unlin
unlink	unlink
unload	unload
unloaded	
unload	
unloading	unload
unloads	unload
unlock	unlock
unlocks	unlock
unlook	unlook

unlooked	unlook
unloos	unloo
unloose	unloos
unlov	unlov
unloving	unlov
unluckily	unluckili
unlucky	unlucki
unmade	unmad
unmake	unmak
unmanly	unmanli
unmann	unmann
unmanner	unmann
unmannerd	unmannerd
unmannerly	unmannerli
unmarried	unmarri
unmask	unmask
unmasked	unmask
unmasking	unmask
unmasks	unmask
unmast	unmast
unmatch	unmatch
unmatchable	unmatch
unmatched	unmatch
unmeasurable	unmeasur
unmeet	unmeet
unmellowed	
unmellow	
unmerciful	unmerci
unmeritable	unmerit
unmeriting	unmerit
unminded	unmind
unmindfull	unmindful
unmingled	unmingl
unmitigable	unmitig
unmitigated	unmitig
unmix	unmix
unmoan	unmoan
unmov	unmov
unmoved	unmov
unmoving	unmov
unmuffles	unmuffl
unmuffling	unmuffl
unmusical	unmus
unmuzzle	unmuzzl
unmuzzled	unmuzzl
unnatural	unnatur
unnaturally	unnatur
unnaturalness	unnatur

unnecessarily	unnecessarili
unnecessary	unnecessari
unneighbourly	unneighbourli
unnerved	unnerv
unnoble	unnobl
unnoted	unnot
unnumb	unnumb
unnumber	unnumb
unowed	
unow	
unpack	unpack
unpaid	unpaid
unparagon	unparagon
unparallel	unparallel
unpartial	unparti
unpath	unpath
unpaved	unpav
unpay	unpai
unpeaceable	unpeac
unpeg	unpeg
unpeople	unpeopl
unpeopled	unpeopl
unperfect	unperfect
unperfectness	unperfect
unpick	unpick
unpin	unpin
unpink	unpink
unpitied	unpiti
unpitifully	unpitifulli
unplagu	unplagu
unplausible	unplaus
unpleas	unplea
unpleasant	unpleas
unpleasing	unpleas
unpolicied	unpolici
unpolish	unpolish
unpolished	unpolish
unpolluted	unpollut
unpossess	unpossess
unpossessing	unpossess
unpossible	unposs
unpractis	unpracti
unpregnant	unpregn
unpremeditated	unpremedit
unprepar	unprepar
unprepared	unprepar
unpress	unpress
unprevailing	unprevail

unprevented	unprev
unpriz	unpriz
unprizable	unpriz
unprofitable	unprofit
unprofited	unprofit
unproper	unprop
unproperly	unproperli
unproportion	unproport
unprovide	unprovid
unprovided	unprovid
unprovident	unprovid
unprovokes	unprovok
unprun	unprun
unpruned	unprun
unpublish	unpublish
unpurged	unpurg
unpurpos	unpurpo
unqualitied	unqual
unqueen	unqueen
unquestion	unquest
unquestionable	unquestion
unquiet	unquiet
unquietly	unquietli
unquietness	unquiet
unraised	unrais
unrak	unrak
unread	unread
unready	unradi
unreal	unreal
unreasonable	unreason
unreasonably	unreason
unreclaimed	unreclaim
unreconciled	unreconcil
unreconciliable	unreconcili
unrecounted	unrecount
unrecuring	unrecur
unregarded	unregard
unregist	unregist
unrelenting	unrel
unremovable	unremov
unremovably	unremov
unreprievable	unrepriev
unresolv	unresolv
unrespected	unrespect
unrespective	unrespect
unrest	unrest
unrestor	unrestor
unrestrained	unrestrain

unreveng	unreveng
unreverend	unreverend
unreverent	unrever
unrevers	
unrev	
unrewarded	unreward
unrighteous	unright
unrightful	unright
unripe	unrip
unripp	unripp
unrivall	unrival
unroll	unrol
unroof	unroof
unroosted	unroost
unroot	unroot
unrough	unrough
unruly	unruli
unsafe	unsaf
unsaluted	unsalut
unsanctified	unsanctifi
unsatisfied	unsatisfi
unsavoury	unsavouri
unsay	unsai
unscalable	unscal
unscann	unscann
unscarr	unscarr
unschool	unschool
unscorch	unscorch
unscour	unscour
unscratch	unscratch
unseal	unseal
unseam	unseam
unsearch	unsearch
unseason	unseason
unseasonable	unseason
unseasonably	unseason
unseasoned	unseason
unseconded	unsecond
unsecret	unsecret
unseduc	unseduc
unseeing	unse
unseeming	unseem
unseemly	unseemli
unseen	unseen
unseminar	unseminar
unseparable	unsepar
unserviceable	unservic
unset	unset

unsettle	unsettl
unsettled	unsettl
unsever	unsev
unsex	unsex
unshak	unshak
unshaked	unshak
unshaken	unshaken
unshaped	unshap
unshapes	unshap
unsheath	unsheath
unsheathe	unsheath
unshorn	unshorn
unshout	unshout
unshown	unshown
unshrinking	unshrink
unshrubb	unshrubb
unshunn	unshunn
unshunnable	
unshunn	
unsifted	unsift
unsightly	unsightli
unsinew	unsinew
unsisting	unsist
unskilful	unskil
unskilfully	unskilfulli
unskillful	unskil
unslipping	unslip
unsmirched	unsmirch
unsoil	unsoil
unsolicited	unsolicit
unsorted	unsort
unsought	unsought
unsound	unsound
unsounded	unsound
unspeak	unspeak
unspeakable	unspeak
unspeaking	unspeak
unsphere	unspher
unspoke	unspok
unspoken	unspoken
unspotted	unspot
unsquar	unsquar
unstable	unstabl
unstaid	unstaid
unstain	unstain
unstained	unstain
unstanch	unstanch
unstate	unstat

unsteadfast	
unsteadfast	
unstooping	unstoop
unstringed	unstring
unstuff	unstuff
unsubstantial	unsubstanti
unsuitable	unsuit
unsuiting	unsuit
unsullied	unsulli
unsunn	unsunn
unsur	unsur
unsure	unsur
unsuspected	unsuspect
unsway	unswai
unswayable	unsway
unswayed	unswai
unswear	unswear
unswept	unswept
unsworn	unsworn
untainted	untaint
untalk	untalk
untangle	untangl
untangled	untangl
untasted	untast
untaught	untaught
untempering	untemp
untender	untend
untent	untent
untented	untent
unthankful	unthank
unthankfulness	unthank
unthink	unthink
unthought	unthought
unthread	unthread
unthrift	unthrift
unthrifths	unthrift
unthrifty	unthrifiti
untie	unti
untied	unti
until	until
untimber	untimb
untimely	untim
untir	untir
untirable	untir
untired	untir
untitled	untitl
unto	unto
untold	untold

untouch	untouch
untoward	untoward
untowardly	untowardli
untraded	untrad
untrain	untrain
untrained	untrain
untread	untread
untreasur	untreasur
untried	untri
untrimmed	untrim
untrod	untrod
untrodden	untrodden
untroubled	untroubl
untrue	untru
untrussing	
untruss	
untruth	untruth
untruths	untruth
untucked	untuck
untun	untun
untune	untun
untuneable	untun
untutor	untutor
untutored	untutor
untwine	untwin
unurg	unurg
unus	unu
unused	unus
unusual	unusu
unvalued	unvalu
unvanquish	unvanquish
unvarnish	unvarnish
unveil	unveil
unveiling	unveil
unvenerable	unvener
unvex	unvex
unviolated	unviol
unvirtuous	unvirtu
unvisited	unvisit
unvulnerable	unvulner
unwares	unwar
unwarily	unwarili
unwash	unwash
unwatch	unwatch
unwearied	unweari
unwed	unw
unwedgeable	

unwedg	
unweeded	unweed
unweighed	unweigh
unweighing	unweigh
unwelcome	unwelcom
unwept	unwept
unwhipp	unwhipp
unwholesome	unwholesom
unwieldy	unwieldi
unwilling	unwil
unwillingly	unwillingli
unwillingness	unwilling
unwind	unwind
unwiped	unwip
unwise	unwis
unwisely	unwis
unwish	unwish
unwished	unwish
unwitted	unwit
unwittingly	unwittingli
unwonted	unwont
unwooded	unwoo
unworthier	unworthi
unworthiest	unworthiest
unworthily	unworthili
unworthiness	unworthi
unworthy	unworthi
unwrung	unwrung
unyok	unyok
unyoke	unyok
up	up
upbraid	upbraid
upbraided	upbraid
upbraidings	upbraid
upbraids	upbraid
uphoarded	uphoard
uphold	uphold
upholdeth	upholdeth
upholding	uphold
upholds	uphold
uplift	uplift
uplifted	uplift
upmost	upmost
upon	upon
upper	upper
uprear	uprear
upreared	uprear
upright	upright

uprighteously	upright
uprightness	upright
uprise	upris
uprising	upris
uproar	uproar
uproars	uproar
uprous	uprou
upshoot	upshoot
upshot	upshot
upside	upsid
upspring	upspr
upstairs	upstair
upstart	upstart
upturned	upturn
upward	upward
upwards	upward
urchin	urchin
urchinfield	urchinfield
urchins	urchin
urg	urg
urge	urg
urged	urg
urgent	urgent
urges	urg
urgest	urgest
urging	urg
urinal	urin
urinals	urin
urine	urin
urn	urn
urns	urn
urs	ur
ursa	ursa
ursley	urslei
ursula	ursula
urswick	urswick
us	us
usage	usag
usance	usanc
usances	usanc
use	us
used	us
useful	us
useless	useless
user	user
uses	us
usest	usest

useth	useth
usher	usher
ushered	usher
ushering	usher
ushers	usher
using	us
usual	usual
usually	usual
usurer	usur
usurers	usur
usuries	usuri
usuring	usur
usurp	usurp
usurpation	usurp
usurped	usurp
usurper	usurp
usurpers	usurp
usurping	usurp
usurpingly	usurpingli
usurps	usurp
usury	usuri
ut	ut
utensil	utensil
utensils	utensil
utility	util
utmost	utmost
utt	utt
utter	utter
utterance	utter
uttered	utter
uttereth	uttereth
uttering	utter
utterly	
	utterli
uttermost	uttermost
utters	utter
uy	uy
v	v
va	va
vacancy	vacanc
vacant	vacant
vacation	vacat
vade	vade
vagabond	vagabond
vagabonds	vagabond
vagram	vagram
vagrom	vagrom
vail	vail

vailed	vail
vailing	vail
vaillant	vaillant
vain	vain
vainer	vainer
vainglory	vainglori
vainly	vainli
vainness	vain
vais	vai
valanc	valanc
valance	valanc
vale	vale
valence	valenc
valentine	valentin
valentinus	valentinu
valentio	valentio
valeria	
valeria	
valerius	valeriu
vales	vale
valiant	valiant
valiantly	valiantli
valiantness	valiant
validity	valid
vallant	vallant
valley	vallei
valleys	vallei
vally	valli
valor	valor
valorous	valor
valorously	valor
valour	valour
valu	valu
valuation	valuat
value	valu
valued	valu
valueless	valueless
values	valu
valuing	valu
vane	vane
vanish	vanish
vanished	vanish
vanishes	vanish
vanishest	vanishest
vanishing	vanish
vanities	vaniti
vanity	vaniti
vanquish	vanquish

vanquished	vanquish
vanquisher	vanquish
vanquishest	vanquishest
vanquisheth	vanquisheth
vant	vant
vantage	vantag
vantages	vantag
vantbrace	vantbrac
vapians	vapian
vapor	vapor
vaporous	vapor
vapour	vapour
vapours	vapour
vara	vara
variable	variabl
variance	varianc
variation	variat
variations	variat
varied	vari
variest	variest
variety	varieti
varld	varld
varlet	varlet
varletry	varletri
varlets	varlet
varletto	varletto
varnish	varnish
varrius	varriu
varro	varro
vary	vari
varying	vari
vassal	vassal
vassalage	vassalag
vassals	vassal
vast	vast
vastidity	vastid
vasty	vasti
vat	vat
vater	vater
vaudemont	vaudemont
vaughan	vaughan
vault	vault
vaultages	vaultag
vaulted	vault
vaulting	vault
vaults	vault
vaulty	vaulti

vaumond	vaumond
vaunt	vaunt
vaunted	vaunt
vaunter	vaunter
vaunting	vaunt
vauntingly	vauntingli
vaunts	vaunt
vauvado	vauvado
vaux	vaux
vaward	vaward
ve	ve
veal	veal
vede	vede
vehemence	vehem
vehemency	vehem
vehement	vehement
vehor	
vehor	
veil	veil
veiled	veil
veiling	veil
vein	vein
veins	vein
vell	vell
velure	velur
velutus	velutu
velvet	velvet
vendible	vendibl
venerable	vener
venereal	vener
venetia	venetia
venetian	venetian
venetians	venetian
veneys	venei
venge	veng
vengeance	vengeanc
vengeances	vengeanc
vengeful	veng
veni	veni
venial	venial
venice	venic
venison	venison
venit	venit
venom	venom
venomous	venom
venomously	venom
vent	vent
ventages	ventag

vented	vent
ventidius	
ventidui	
ventricle	ventricl
vents	vent
ventur	ventur
venture	ventur
ventured	ventur
ventures	ventur
venturing	ventur
venturous	ventur
venue	venu
venus	venu
venuto	venuto
ver	ver
verb	verb
verba	verba
verbal	verbal
verbatim	verbatim
verbosity	verbos
verdict	verdict
verdun	verdun
verdure	verdur
vere	vere
verefore	verefor
verg	verg
verge	verg
vergers	verger
verges	verg
verier	verier
veriest	veriest
verified	verifi
verify	verifi
verily	verili
veritable	verit
verite	verit
verities	veriti
verity	veriti
vermilion	vermilion
vermin	vermin
vernon	vernon
verona	verona
veronesa	veronesa
versal	versal
verse	vers
verses	vers
versing	vers

vert	vert
very	veri
vesper	vesper
vessel	vessel
vessels	vessel
vestal	vestal
vestments	vestment
vesture	vestur
vetch	vetch
vetches	vetch
veux	veux
vex	vex
vexation	vexat
vexations	vexat
vexed	vex
vexes	vex
vexest	vexest
vexeth	vexeth
vexing	vex

vi	vi
via	via
vial	vial
vials	vial
viand	viand
viands	viand
vic	vic
vicar	vicar
vice	vice
vicegerent	viceger
vicentio	vicentio
viceroi	viceroi
viceroys	viceroi
vices	vice
vici	vici
vicious	viciou
viciousness	vicious
vict	vict
victims	victim
victor	victor
victoress	victoress
victories	victori
victorious	victori
victors	victor
victory	victori
victual	victual
victuall	victual
victuals	victual

videlicet	videlicet
video	video
vides	vide
videsne	
videsn	
vidi	vidi
vie	vie
vied	vi
vienna	vienna
view	view
viewest	viewest
vieweth	vieweth
viewing	view
viewless	viewless
views	view
vigil	vigil
vigilance	vigil
vigilant	vigil
vigitant	vigit
vigour	vigour
vii	vii
viii	viii
vile	vile
vilely	vile
vileness	vile
viler	viler
vilest	vilest
vill	vill
village	villag
villager	villag
villagery	villageri
villages	villag
villain	villain
villainies	villaini
villainous	villain
villainously	villain
villains	
villain	
villainy	villaini
villanies	villani
villanous	villan
villany	villani
villiago	villiago
villian	villian
villianda	villianda
villians	villian
vinaigre	vinaigr
vincentio	vincentio

vincere	vincer
vindicative	vindic
vine	vine
vinegar	vinegar
vines	vine
vineyard	vineyard
vineyards	vineyard
vint	vint
vintner	vintner
viol	viol
viola	viola
violate	violat
violated	violat
violates	violat
violation	violat
violator	violat
violence	violenc
violent	violent
violenta	violenta
violenteth	violenteth
violently	
violent	
violet	violet
violets	violet
viper	viper
viperous	viper
vipers	viper
vir	vir
virgilia	virgilia
virgin	virgin
virginal	virgin
virginalling	virginal
virginity	virgin
virginus	virginu
virgins	virgin
virgo	virgo
virtue	virtu
virtues	virtu
virtuous	virtuou
virtuously	virtuous
visag	visag
visage	visag
visages	visag
visard	visard
viscount	viscount
visible	visibl
visibly	visibl
vision	vision

visions	vision
visit	visit
visitation	visit
visitations	visit
visited	
visit	
visiting	visit
visitings	visit
visitor	visitor
visitors	visitor
visits	visit
visor	visor
vita	vita
vitae	vita
vital	vital
vitement	vitement
vitruvio	vitruvio
vitx	vitx
viva	viva
vivant	vivant
vive	vive
vixen	vixen
viz	viz
vizaments	vizament
vizard	vizard
vizarded	vizard
vizards	vizard
vizor	vizor
vlouting	vlout
vocation	vocat
vocativo	vocativo
vocatur	vocatur
voce	voce
voic	voic
voice	voic
voices	voic
void	void
voided	
void	
voiding	void
voke	voke
volable	volabl
volant	volant
volivorco	volivorco
volley	vollei
volquessen	volquessen
volsce	volsc
volsces	volsc

volscian	volscian
volscians	volscian
volt	volt
voltemand	voltemand
volubility	volubl
voluble	volubl
volume	volum
volumes	volum
volumnia	volumnia
volumnius	volumniu
voluntaries	voluntari
voluntary	voluntari
voluptuously	voluptu
voluptuousness	voluptu
vomissement	vomiss
vomit	vomit
vomits	vomit
vor	vor
vore	vore
vortnight	vortnight
vot	vot
votaries	
votari	
votarist	votarist
votarists	votarist
votary	votari
votre	votr
vouch	vouch
voucher	voucher
vouchers	voucher
vouches	vouch
vouching	vouch
vouchsaf	vouchsaf
vouchsafe	vouchsaf
vouchsafed	vouchsaf
vouchsafes	vouchsaf
vouchsafing	vouchsaf
voudrais	voudrai
vour	vour
vous	vou
voutsafe	voutsaf
vow	vow
vowed	vow
vowel	vowel
vowels	vowel
vowing	vow
vows	vow
vox	vox

voyage	voyag
voyages	voyag
vraiment	vraiment
vulcan	vulcan
vulgar	vulgar
vulgarly	vulgarli
vulgars	vulgar
vulgo	vulgo
vulnerable	vulner
vulture	vultur
vultures	vultur
vrurther	vrurther
w	w
wad	wad
waddled	waddl
wade	wade
waded	wade
wafer	wafer
waft	waft
waftage	waftag
wafting	waft
wafts	waft
wag	wag
wage	wage
wager	wager
wagers	wager
wages	wage
wagging	wag
waggish	waggish
wagging	waggl
waggon	waggon
waggoner	waggon
wagon	wagon
wagoner	wagon
wags	wag
wagtail	wagtail
wail	wail
wailful	wail
wailing	
wail	
wails	wail
wain	wain
wainropes	wainrop
wainscot	wainscot
waist	waist
wait	wait
waited	wait
waiter	waiter

waiteth	waiteth
waiting	wait
waits	wait
wak	wak
wake	wake
waked	wake
wakefield	wakefield
waken	waken
wakened	waken
wakes	wake
wakest	wakest
waking	wake
wales	wale
walk	walk
walked	walk
walking	walk
walks	walk
wall	wall
walled	wall
wallet	wallet
wallets	wallet
wallon	wallon
walloon	walloon
wallow	
wallow	
walls	wall
walnut	walnut
walter	walter
wan	wan
wand	wand
wander	wander
wanderer	wander
wanderers	wander
wandering	wander
wanders	wander
wands	wand
wane	wane
waned	wane
wanes	wane
waning	wane
wann	wann
want	want
wanted	want
wanteth	wanteth
wanting	want
wanton	wanton
wantonly	wantonli
wantonness	wanton

wantons	wanton
wants	want
wappen	wappen
war	war
warble	warbl
warbling	warbl
ward	ward
warded	ward
warden	warden
warder	warder
warders	warder
wardrobe	wardrob
wardrop	wardrop
wards	ward
ware	ware
wares	ware
warily	warili
warkworth	warkworth
warlike	warlik
warm	warm
warmed	warm
warmer	warmer
warming	warm
warms	warm
warmth	warmth
warn	warn
warned	warn
warning	warn
warnings	warn
warns	warn
warp	warp
warped	warp
warr	warr
warrant	warrant
warranted	warrant
warranteth	warranteth
warrantise	warrantis
warrantize	warrant
warrants	warrant
warranty	warranti
warren	
warren	
warrener	warren
warring	war
warrior	warrior
warriors	warrior
wars	war
wart	wart

warwick	warwick
warwickshire	warwickshir
wary	wari
was	wa
wash	wash
washed	wash
washer	washer
washes	wash
washford	washford
washing	wash
wasp	wasp
waspish	waspish
wasps	wasp
wassail	wassail
wassails	wassail
wast	wast
waste	wast
wasted	wast
wasteful	wast
wasters	waster
wastes	wast
wasting	wast
wat	wat
watch	watch
watched	watch
watchers	watcher
watches	watch
watchful	watch
watching	watch
watchings	watch
watchman	watchman
watchmen	watchmen
watchword	watchword
water	water
waterdrops	waterdrop
watered	water
waterfly	waterfli
waterford	waterford
watering	water
waterish	waterish
waterpots	waterpot
waterrugs	waterrug
waters	water
waterton	waterton
watery	wateri
wav	wav
wave	wave
waved	wave

waver	waver
waverer	waver
wavering	waver
waves	wave
waving	wave
waw	waw
wawl	wawl
wax	wax
waxed	wax
waxen	
	waxen
waxes	wax
waxing	wax
way	wai
waylaid	waylaid
waylay	waylai
ways	wai
wayward	wayward
waywarder	wayward
waywardness	wayward
we	we
weak	weak
weaken	weaken
weakens	weaken
weaker	weaker
weakest	weakest
weakling	weakl
weakly	weakli
weakness	weak
weal	weal
wealsmen	wealsmen
wealth	wealth
wealthiest	wealthiest
wealthily	wealthili
wealthy	wealthi
wealtily	wealtlli
wean	wean
weapon	weapon
weapons	weapon
wear	wear
wearer	wearer
wearers	wearer
wearied	weari
wearies	weari
weariest	weariest
wearily	wearili
weariness	weari
wearing	wear

wearisome	wearisom
wears	wear
weary	weari
weasel	weasel
weather	weather
weathercock	weathercock
weathers	weather
weav	weav
weave	weav
weaver	weaver
weavers	weaver
weaves	weav
weaving	weav
web	web
wed	wed
wedded	wed
wedding	wed
wedg	wedg
wedged	wedg
wedges	wedg
wedlock	wedlock
wednesday	wednesdai
weed	weed
weeded	weed
weeder	weeder
weeding	weed
weeds	weed
weedy	weedi
week	week
weeke	week
weekly	weekli
weeks	week
ween	ween
weening	ween
weep	weep
weeper	weeper
weeping	weep
weepingly	weepingli
weepings	weep
weeps	weep
weet	weet
weigh	weigh
weighed	weigh
weighing	weigh
weighs	weigh
weight	weight
weightier	weightier
weightless	weightless

weights	weight
weighty	weighti
weird	weird
welcom	welcom
welcome	welcom
welcomer	welcom
welcomes	welcom
welcomest	welcomest
welfare	welfar
welkin	
welkin	
well	well
wells	well
welsh	welsh
welshman	welshman
welshmen	welshmen
welshwomen	welshwomen
wench	wench
wenches	wench
wenching	wench
wend	wend
went	went
wept	wept
weraday	weradai
were	were
wert	wert
west	west
western	western
westminster	westminst
westmoreland	westmoreland
westward	westward
wet	wet
wether	wether
wetting	wet
wezend	wezend
whale	whale
whales	whale
wharf	wharf
wharfs	wharf
what	what
whate	whate
whatever	whatev
whatsoe	
whatso	
whatsoever	whatsoev
whatsome	whatsom
whe	whe
wheat	wheat

wheaten	wheaten
wheel	wheel
wheeling	wheel
wheels	wheel
weeer	weeer
wheeson	wheeson
wheezing	wheez
whelk	whelk
whelks	whelk
whelm	whelm
whelp	whelp
whelped	whelp
whelps	whelp
when	when
whenas	whena
whence	whenc
whencesoever	whencesoev
whene	whene
whenever	whenev
whensoever	whensoev
where	where
whereabout	whereabout
whereas	wherea
whereat	whereat
whereby	wherebi
wherefore	wherefor
wherein	
wherein	
whereinto	whereinto
whereof	whereof
whereon	whereon
whereout	whereout
whereso	whereso
wheresoe	whereso
wheresoever	wheresoev
wheresome	wheresom
whereto	whereto
whereuntil	whereuntil
whereunto	whereunto
whereupon	whereupon
wherever	wherev
wherewith	wherewith
wherewithal	wherewith
whet	whet
whether	whether
whetstone	whetston
whetted	whet
whew	whew

whey	whei
which	which
whiff	whiff
whiffler	whiffler
while	while
whiles	while
whilst	whilst
whin	whin
whine	whine
whined	whine
whinid	
whinid	
whining	whine
whip	whip
whipp	whipp
whippers	whipper
whipping	whip
whips	whip
whipster	whipster
whipstock	whipstock
whipt	whipt
whirl	whirl
whirled	whirl
whirligig	whirligig
whirling	whirl
whirlpool	whirlpool
whirls	whirl
whirlwind	whirlwind
whirlwinds	whirlwind
whisp	whisp
whisper	whisper
whispering	whisper
whisperings	whisper
whispers	whisper
whist	whist
whistle	whistl
whistles	whistl
whistling	whistl
whit	whit
white	white
whitehall	whitehal
whitely	white
whiteness	
white	
whiter	whiter
whites	white
whitest	whitest
whither	whither

whiting	white
whitmore	whitmor
whitsters	whitster
whitsun	whitsun
whittle	whittl
whizzing	whizz
who	who
whoa	whoa
whoe	whoe
whoever	whoever
whole	whole
wholesom	wholesom
wholesome	wholesom
wholly	wholli
whom	whom
whoobub	whoobub
whoop	whoop
whooping	whoop
whor	whor
whore	whore
whoremaster	whoremast
whoremasterly	whoremasterli
whoremonger	whoremong
whores	whore
whoreson	whoreson
whoresons	whoreson
whoring	
whore	
whorish	whorish
whose	whose
whoso	whoso
whosoe	whoso
whosoever	whosoev
why	why
wi	wi
wick	wick
wicked	wick
wickednes	wickedn
wickedness	wicked
wicket	wicket
wicky	wicki
wid	wid
wide	wide
widens	widen
wider	wider
widow	widow
widowed	widow
widower	widow

widowhood	widowhood
widows	widow
wield	wield
wife	wife
wight	wight
wights	wight
wild	wild
wildcats	wildcat
wilder	wilder
wilderness	wilder
wildest	wildest
wildfire	
wildfir	
wildly	wildli
wildness	wild
wilds	wild
wiles	wile
wilful	wil
wilfull	wilful
wilfully	wilfulli
wilfulnes	wilfuln
wilfulness	wil
will	will
willed	will
willers	willer
willeth	willeth
william	william
williams	william
willing	will
willingly	willingli
willingness	willing
willoughby	willoughbi
willow	willow
wills	will
wilt	wilt
wiltshire	wiltshir
wimpled	wimpl
win	win
wince	winc
winch	winch
winchester	winchest
wincot	wincot
wind	wind
winded	wind
windgalls	windgal
winding	wind
windlasses	windlass
windmill	windmil

window	window
windows	window
windpipe	windpip
winds	wind
windsor	windsor
windy	windi
wine	wine
wing	wing
winged	wing
wingfield	wingfield
wingham	wingham
wings	wing
wink	wink
winking	wink
winks	wink
winner	winner
winner	winner
winning	win
winnow	winnow
winnowed	winnow
winnows	winnow
wins	win
winter	winter
winterly	winterli
winters	winter
wip	wip
wipe	wipe
wiped	wipe
wipes	wipe
wiping	wipe
wire	wire
wires	wire
wiry	wiri
wisdom	wisdom
wisdoms	wisdom
wise	wise
wiselier	wiseli
wisely	wise
wiser	wiser
wisest	wisest
wish	wish
wished	wish
wisher	wisher
wishers	wisher
wishes	wish
wishest	wishest
wisheth	wisheth
wishful	wish

wishing	wish
wishtly	wishtli
wisp	wisp
wist	wist
wit	wit
witb	witb
witch	witch
witchcraft	witchcraft
witches	witch
witching	witch
with	with
withal	withal
withdraw	withdraw
withdrawing	withdraw
withdrawn	withdrawn
withdrew	withdrew
wither	wither
withered	wither
withering	wither
withers	wither
withheld	withheld
withhold	withhold
withholds	withhold
within	within
withold	withold
without	without
withstand	withstand
withstanding	withstand
withstood	withstood
witless	witless
witness	wit
witnesses	wit
witnesseth	witnesseth
witnessing	wit
wits	wit
witted	wit
wittenberg	wittenberg
wittiest	wittiest
wittily	wittili
witting	wit
wittingly	wittingli
wittol	wittol
wittolly	
wittolli	
witty	witti
wiv	wiv
wive	wive

wived	wive
wives	wive
wiving	wive
wizard	wizard
wizards	wizard
wo	wo
woe	woe
woeful	woeful
woefull	woeful
woefullest	woefullest
woes	woe
woful	woful
wolf	wolf
wolfish	wolfish
wolsey	wolsei
wolves	wolv
wolvish	wolvish
woman	woman
womanhood	womanhood
womanish	womanish
womankind	womankind
womanly	womanli
womb	womb
wombs	womb
womby	wombi
women	women
won	won
woncot	woncot
wond	
wond	
wonder	wonder
wondered	wonder
wonderful	wonder
wonderfully	wonderfulli
wondering	wonder
wonders	wonder
wondrous	wondrou
wondrously	wondrous
wont	wont
wonted	wont
woo	woo
wood	wood
woodbine	woodbin
woodcock	woodcock
woodcocks	woodcock
wooden	wooden
woodland	woodland
woodman	woodman

woodmonger	woodmong
woods	wood
woodstock	woodstock
woodville	woodvil
woed	woo
woer	woer
woers	woer
woes	woe
woof	woof
woing	woo
woingly	woingli
wool	wool
woollen	woollen
woolly	woolli
woolsack	woolsack
woolsey	woolsei
woolward	woolward
woos	woo
wor	wor
worcester	worcest
word	word
words	word
wore	wore
worins	worin
work	work
workers	worker
working	work
workings	work
workman	workman
workmanly	workmanli
workmanship	workmanship
workmen	workmen
works	work
worky	worki
world	world
worldlings	worldl
worldly	worldli
worlds	world
worm	worm
worms	worm
wormwood	wormwood
wormy	wormi
worn	worn
worried	worri
worries	
worri	
worry	worri
worrying	worri

worse	wors
worser	worser
worship	worship
worshipful	worship
worshipfully	worshipfulli
worshipp	worshipp
worshipper	worshipp
worshippers	worshipp
worshippest	worshippest
worships	worship
worst	worst
worsted	worst
wort	wort
worth	worth
worthied	worthi
worthier	worthier
worthies	worthi
worthiest	worthiest
worthily	worthili
worthiness	worthi
worthless	worthless
worths	worth
worthy	worthi
worts	wort
wot	wot
wots	wot
wotting	wot
wouid	wouid
would	
would	
wouldest	wouldest
wouldst	wouldst
wound	wound
wounded	wound
wounding	wound
woundings	wound
woundless	woundless
wounds	wound
wouns	woun
woven	woven
wow	wow
wrack	wrack
wrackful	wrack
wrangle	wrangl
wrangler	wrangler
wranglers	wrangler
wrangling	wrangl
wrap	wrap

wrapp	wrapp
wraps	wrap
wrapt	wrapt
wrath	wrath
wrathful	wrath
wrathfully	wrathfulli
wraths	wrath
wreak	wreak
wreakful	wreak
wreaks	wreak
wreath	wreath
wreathed	wreath
wreathen	wreathen

wreaths	wreath
wreck	wreck
wrecked	wreck
wrecks	wreck
wren	wren
wrench	wrench
wrenching	wrench
wrens	wren
wrest	wrest
wrested	wrest
wresting	wrest
wrestle	wrestl
wrestled	wrestl
wrestler	wrestler
wrestling	wrestl
wretch	wretch
wretchcd	wretchcd
wretched	wretch
wretchedness	wretched
wretches	wretch
wring	wring
wringer	wringer
wringing	wring
wrings	wring
wrinkle	wrinkl
wrinkled	wrinkl
wrinkles	wrinkl
wrist	wrist
wrists	wrist
writ	writ
write	write
writer	
writer	
writers	writer

writes	write
writhled	writhl
writing	write
writings	write
writs	writ
written	written
wrong	wrong
wronged	wrong
wronger	wronger
wrongful	wrong
wrongfully	wrongfulli
wronging	wrong
wrongly	wrongli
wrongs	wrong
wronk	wronk
wrote	wrote
wroth	wroth
wrought	wrought
wrung	wrung
wry	wry
wrying	wry
wt	wt
wul	wul
wye	wye
x	x
xanthippe	xanthipp
xi	xi
xii	xii
xiii	xiii
xiv	xiv
xv	xv
y	
	y
yard	yard
yards	yard
yare	yare
yarely	yare
yarn	yarn
yaughan	yaughan
yaw	yaw
yawn	yawn
yawning	yawn
ycleped	yclepe
ycliped	yclipe
ye	ye
yea	yea
yead	yead
year	year

yearly	yearli
yearn	yearn
yearns	yearn
years	year
yeas	yea
yeast	yeast
yedward	yedward
yell	yell
yellow	yellow
yellowed	yellow
yellowing	yellow
yellowness	yellow
yellows	yellow
yells	yell
yelping	yelp
yeoman	yeoman
yeomen	yeomen
yerk	yerk
yes	ye
yesterday	yesterdai
yesterdays	yesterdai
yesternight	yesternight
yesty	yesti
yet	yet
yew	yew
yield	yield
yield	yield
yielded	yield
yielder	yielder
yielders	yielder
yielding	yield
yields	yield
yok	yok
yoke	yoke
yoked	yoke
yokefellow	yokefellow
yokes	yoke
yoketh	yoketh
yon	yon
yond	yond
yonder	yonder
yongrey	yongrei
yore	yore
yorick	yorick
york	york
yorkists	yorkist
yorks	york
yorkshire	yorkshir

```

you
  you
young    young
younger  younger
youngest youngest
youngling youngl
younglings youngl
youngly  youngli
yunker   yunker
your     your
yours    your
yourself yourself
yourselves yourselv
youth    youth
youthful youth
youths   youth
youtli   youtli
zanies   zani
zany     zani
zeal     zeal
zealous  zealou
zeals    zeal
zed      zed
zenelophon zenelophon
zenith   zenith
zephyrs  zephyr
zir      zir
zo       zo
zodiac   zodiac
zodiacs  zodiac
zone     zone
zounds   zound
zwagger  zwagger
}

```

```

# Create a full-text index to use for testing the stemmer.
#
db close
sqlite3 db :memory:
db eval {
  CREATE VIRTUAL TABLE t1 USING fts1(word, tokenize Porter);
}

```

```

foreach {pfrom pto} $porter_test_data {
do_test fts1porter-$pfrom {
  execsql {
    DELETE FROM t1_term;

```

```
DELETE FROM t1_content;
INSERT INTO t1(word) VALUES($pfrom);
SELECT term FROM t1_term;
}
} $pto
}
```

finish_test

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/test/fts1porter.test
No license file was found, but licenses were detected in source scan.
```

public domain.

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/changes.html
No license file was found, but licenses were detected in source scan.
```

License: Public Domain

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite.spec
No license file was found, but licenses were detected in source scan.
```

is free to use SQLite from multiple threads, but it must make sure

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/custombuild.html
No license file was found, but licenses were detected in source scan.
```

/*

** 2004 May 22

**

** The author disclaims copyright to this source code. In place of

** a legal notice, here is a blessing:

**

** May you do good and not evil.

** May you find forgiveness for yourself and forgive others.

** May you share freely, never taking more than you give.

**

**

** This file contains the VFS implementation for unix-like operating systems

```

** include Linux, MacOSX, *BSD, QNX, VxWorks, AIX, HPUX, and others.
**
** There are actually several different VFS implementations in this file.
** The differences are in the way that file locking is done. The default
** implementation uses Posix Advisory Locks. Alternative implementations
** use flock(), dot-files, various proprietary locking schemas, or simply
** skip locking all together.
**
** This source file is organized into divisions where the logic for various
**
subfunctions is contained within the appropriate division. PLEASE
** KEEP THE STRUCTURE OF THIS FILE INTACT. New code should be placed
** in the correct division and should be clearly labeled.
**
** The layout of divisions is as follows:
**
** * General-purpose declarations and utility functions.
** * Unique file ID logic used by VxWorks.
** * Various locking primitive implementations (all except proxy locking):
**   + for Posix Advisory Locks
**   + for no-op locks
**   + for dot-file locks
**   + for flock() locking
**   + for named semaphore locks (VxWorks only)
**   + for AFP filesystem locks (MacOSX only)
** * sqlite3_file methods not associated with locking.
** * Definitions of sqlite3_io_methods objects for all locking
**   methods plus "finder" functions for each locking method.
** * sqlite3_vfs method implementations.
** * Locking primitives for the proxy uber-locking-method. (MacOSX only)
** * Definitions of sqlite3_vfs objects
for all locking methods
**   plus implementations of sqlite3_os_init() and sqlite3_os_end().
*/

```

Found in path(s):

```

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/src/os_unix.c

```

No license file was found, but licenses were detected in source scan.

```

/*

```

```

** The "printf" code that follows dates from the 1980's. It is in
** the public domain. The original comments are included here for
** completeness. They are very out-of-date but might be useful as
** an historical reference. Most of the "enhancements" have been backed
** out so that the functionality is now the same as standard printf().
**

```

```

**

```

```

** $Id: printf.c,v 1.104 2009/06/03 01:24:54 drh Exp $

```



```

**
*****
**
** The following modules is an enhanced replacement for the "printf" subroutines
** found in the standard C library. The following enhancements are
** supported:
**
** + Additional functions. The standard set of "printf" functions
** includes printf, fprintf, sprintf, vprintf, vfprintf, and
** vsprintf. This module adds the following:
**
** * snprintf -- Works like sprintf, but has an extra argument
**
**         which is the size of the buffer written to.
**
** * mprintf -- Similar to sprintf. Writes output to memory
**         obtained from malloc.
**
** * xprintf -- Calls a function to dispose of output.
**
** * nprintf -- No output, but returns the number of characters
**         that would have been output by printf.
**
** * A v- version (ex: vsnprintf) of every function is also
**         supplied.
**
** + A few extensions to the formatting notation are supported:
**
** * The "=" flag (similar to "-") causes the output to be
**         be centered in the appropriately sized field.
**
** * The %b field outputs an integer in binary notation.
**
** * The %c field now accepts a precision. The character output
**         is repeated by the number of times the precision specifies.
**
** * The %' field works like %c, but takes
**         as its character the
**         next character of the format string, instead of the next
**         argument. For example, printf("%.78'") prints 78 minus
**         signs, the same as printf("%.78c", '-').
**
** + When compiled using GCC on a SPARC, this version of printf is
**         faster than the library printf for SUN OS 4.1.
**
** + All functions are fully reentrant.
**
**/

```

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/src/printf.c
```

No license file was found, but licenses were detected in source scan.

SQLite is open source, and is available in the public domain

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/books.html
```

No license file was found, but licenses were detected in source scan.

application is free to use the same [database connection](./c3ref/sqlite3.html) or the

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/c3ref/c_config_getmalloc.html
```

No license file was found, but licenses were detected in source scan.

SQLite itself is in the [public domain](copyright.html) and can be used for any purpose. But TH3 is proprietary and requires a license.

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/th3.html
```

No license file was found, but licenses were detected in source scan.

```
# 2006 September 14
```

```
#
```

```
# The author disclaims copyright to this source code. In place of
```

```
# a legal notice, here is a blessing:
```

```
#
```

```
# May you do good and not evil.
```

```
# May you find forgiveness for yourself and forgive others.
```

```
# May you share freely, never taking more than you give.
```

```
#
```

```
*****
```

```
# This file implements regression tests for SQLite library. The
```

```
# focus of this script is testing the FTS2 module.
```

```
#
```

```
# $Id: fts2c.test,v 1.1 2006/10/19 23:36:26 shess Exp $
```

```
#
```

```
set testdir [file dirname $argv0]
```

```
source $testdir/tester.tcl
```

If SQLITE_ENABLE_FTS2 is defined, omit this file.

```
ifcapable !fts2 {  
  finish_test  
  return  
}
```

Create a table of sample email data. The data comes from email

archives of Enron executives that was published as part of the

litigation against that company.

#

```
do_test fts2c-1.1 {
```

```
  db eval {
```

```
    CREATE VIRTUAL TABLE email
```

```
    USING fts2([from],[to],subject,body);
```

```
    BEGIN TRANSACTION;
```

```
    INSERT INTO email([from],[to],subject,body) VALUES('savita.puthigai@enron.com', 'traders.eol@enron.com,  
traders.eol@enron.com', 'EnronOnline- Change to Autohedge', 'Effective Monday, October 22, 2001 the following  
changes will be made to the Autohedge functionality on EnronOnline.
```

The volume on the hedge will now respect the minimum volume and volume increment settings on the parent product. See rules below:

? If the transaction volume on the child is less than half of the parent's minimum volume no hedge will occur.

? If the transaction volume on the child is more than half the parent's minimum volume but less than half the volume increment on the parent, the hedge will volume will be the parent's minimum volume.

? For all other volumes, the same rounding rules will apply based on the volume increment on the parent product.

Please see example below:

Parent's Settings:

Minimum: 5000

Increment: 1000

Volume on Autohedge

```
transaction  Volume Hedged
```

```
1    - 2499    0
```

```
2500 - 5499    5000
```

```
5500 - 6499    6000');
```

```
INSERT INTO email([from],[to],subject,body) VALUES('dana.davis@enron.com', 'laynie.east@enron.com,  
lisa.king@enron.com, lisa.best@enron.com,', 'Leaving Early', 'FYI:
```

```
If it's ok with everyone's needs, I would like to leave @4pm. If you think
```

```
you will need my assistance past the 4 o'clock hour just let me know; I'll
```

```
be more than willing to stay.');
```

```
INSERT INTO email([from],[to],subject,body) VALUES('enron_update@concuere workplace.com',
```

```
'louise.kitchen@enron.com', '<<Concur Expense Document>> - CC02.06.02', 'The following expense report is ready  
for approval:
```

Employee Name: Christopher F. Calger

Status last changed by: Mollie E. Gustafson Ms

Expense Report Name: CC02.06.02

Report Total: \$3,972.93

Amount Due Employee: \$3,972.93

To approve this expense report, click on the following link for Concur Expense.

<http://expensecms.enron.com>');

INSERT INTO email([from],[to],subject,body)

VALUES('jeff.duff@enron.com', 'julie.johnson@enron.com', 'Work request', 'Julie,

Could you print off the current work request report by 1:30 today?

Gentlemen,

I'd like to review this today at 1:30 in our office. Also, could you provide me with your activity reports so I can have Julie enter this information.

JD');

INSERT INTO email([from],[to],subject,body) VALUES('v.weldon@enron.com', 'gary.l.carrier@usa.dupont.com, scott.joyce@bankofamerica.com', 'Enron News', 'This could turn into something big....

<http://biz.yahoo.com/rf/010129/n29305829.html>');

INSERT INTO email([from],[to],subject,body) VALUES('mark.haedicke@enron.com', 'paul.simons@enron.com', 'Re: First Polish Deal!', 'Congrats! Things seem to be building rapidly now on the Continent. Mark');

INSERT INTO email([from],[to],subject,body) VALUES('e..carter@enron.com', 't..robinson@enron.com', 'FW: Producers Newsletter 9-24-2001', '

The producer lumber pricing sheet.

-----Original Message-----

From: Johnson, Jay

Sent: Tuesday,

October 16, 2001 3:42 PM

To: Carter, Karen E.

Subject: FW: Producers Newsletter 9-24-2001

-----Original Message-----

From: Daigre, Sergai

Sent: Friday, September 21, 2001 8:33 PM

Subject: Producers Newsletter 9-24-2001

');

INSERT INTO email([from],[to],subject,body) VALUES('david.delainey@enron.com', 'kenneth.lay@enron.com', 'Greater Houston Partnership', 'Ken, in response to the letter from Mr Miguel San Juan, my suggestion would be to offer up the Falcon for their use; however, given the tight time frame and your recent visit with Mr. Fox that it would be difficult for either you or me to participate.

I spoke to Max and he agrees with this approach.

I hope this meets with your approval.

Regards

Delainey');

INSERT INTO email([from],[to],subject,body) VALUES('lachandra.fenceroy@enron.com',
'lindy.donoho@enron.com', 'FW: Bus Applications Meeting Follow Up', 'Lindy,

Here is the original memo we discussed earlier. Please provide any information that you may have.

Your cooperation is greatly appreciated.

Thanks,

lachandra.fenceroy@enron.com
713.853.3884
877.498.3401 Pager

-----Original Message-----

From: Bisbee, Joanne
Sent: Wednesday, September 26, 2001 7:50 AM
To: Fenceroy, LaChandra
Subject: FW: Bus Applications Meeting Follow Up

Lachandra, Please get with David Duff today and see what this is about. Who are our TW accounting business users?

-----Original Message-----

From: Koh, Wendy
Sent: Tuesday, September 25, 2001 2:41 PM
To: Bisbee, Joanne
Subject: Bus Applications Meeting Follow Up

Lisa brought up a TW change effective Nov 1. It involves eliminating a turnback surcharge. I have no other information, but you might check with the business folks for any system changes required.

Wendy');

INSERT INTO email([from],[to],subject,body) VALUES('danny.mccarty@enron.com', 'fran.fagan@enron.com',
'RE: worksheets', 'Fran,

If Julie's merit needs to be lump sum, just move it over to that column. Also, send me Eric Gadd's sheets as well. Thanks.

Dan

-----Original Message-----

From: Fagan, Fran
Sent: Thursday, December 20, 2001 11:10 AM

To: McCarty, Danny
Subject: worksheets

As discussed, attached are your sheets for bonus and merit.

Thanks,

Fran Fagan
Sr. HR Rep
713.853.5219

<< File: McCartyMerit.xls >> << File: mccartyBonusCommercial_UnP.xls >>

);
INSERT INTO email([from],[to],subject,body) VALUES('bert.meyers@enron.com', 'shift.dl-portland@enron.com',
'OCTOBER SCHEDULE', 'TEAM,

PLEASE SEND ME ANY REQUESTS THAT YOU HAVE FOR OCTOBER. SO FAR I HAVE THEM FOR
LEAF. I WOULD LIKE TO HAVE IT DONE BY THE 15TH OF THE MONTH. ANY QUESTIONS PLEASE
GIVE ME A CALL.

BERT');
INSERT INTO email([from],[to],subject,body) VALUES('errol.mclaughlin@enron.com', 'john.arnold@enron.com',
bilal.bajwa@enron.com, john.griffith@enron.com,', 'TRV Notification: (NG - PROPT P/L - 09/27/2001)', 'The
report named: NG - PROPT P/L <http://trv.corp.enron.com/linkFromExcel.asp?report_cd=11&report_name=NG+-+PROPT+P/L&category_cd=5&category_name=FINANCIAL&toc_hide=1&sTV1=5&TV1Exp=Y¤t_efct_date=09/27/2001>,
published as of 09/27/2001 is now available for viewing on the website.');

INSERT INTO email([from],[to],subject,body) VALUES('patrice.mims@enron.com', 'calvin.eakins@enron.com',
'Re: Small business supply assistance', 'Hi Calvin

I spoke with Rickey (boy, is he long-winded!!). Gave him the name of our
credit guy, Russell Diamond.

Thank for your help!);
INSERT INTO email([from],[to],subject,body) VALUES('legal <.hall@enron.com>', 'stephanie.panus@enron.com',
'Termination update', 'City of Vernon and Salt River Project terminated their contracts. I will fax these notices to
you.');

INSERT INTO email([from],[to],subject,body) VALUES('d..steffes@enron.com', 'richard.shapiro@enron.com',
'EES / ENA Government Affairs Staffing & Outside Services', 'Rick --

Here is the information on staffing and outside services. Call if you need anything else.

Jim

);

INSERT INTO email([from],[to],subject,body)

VALUES('gelliott@industrialinfo.com', 'pcopello@industrialinfo.com', 'ECAAR (Gavin), WSCC (Diablo Canyon), & NPCC (Seabrook)', 'Dear Power Outage Database Customer,

Attached you will find an excel document. The outages contained within are forced or rescheduled outages. Your daily delivery will still contain these outages.

In addition to the two excel documents, there is a dbf file that is formatted like your daily deliveries you receive nightly. This will enable you to load the data into your regular database. Any questions please let me know. Thanks.

Greg Elliott

IIR, Inc.

713-783-5147 x 3481

outages@industrialinfo.com

THE INFORMATION CONTAINED IN THIS E-MAIL IS LEGALLY PRIVILEGED AND CONFIDENTIAL INFORMATION INTENDED ONLY FOR THE USE OF THE INDIVIDUAL OR ENTITY NAMED ABOVE. YOU ARE HEREBY NOTIFIED THAT ANY DISSEMINATION, DISTRIBUTION, OR COPY OF THIS E-MAIL TO UNAUTHORIZED ENTITIES IS STRICTLY PROHIBITED. IF YOU HAVE RECEIVED THIS E-MAIL IN ERROR, PLEASE DELETE IT.

- OUTAGE.dbf

- 111201R.xls

- 111201.xls ');

INSERT INTO email([from],[to],subject,body) VALUES('enron.announcements@enron.com', 'all_ena_egm_eim@enron.com', 'EWS Brown Bag', 'MARK YOUR LUNCH CALENDARS NOW !

You are invited to attend the EWS Brown Bag Lunch Series

Featuring: RAY BOWEN, COO

Topic: Enron Industrial Markets

Thursday, March 15, 2001

11:30 am - 12:30 pm

EB 5 C2

You bring your lunch, Limited Seating

We provide drinks and dessert. RSVP x 3-9610');

INSERT INTO email([from],[to],subject,body) VALUES('chris.germany@enron.com',

'ingrid.immer@williams.com', 'Re: About St Pauls', 'Sounds good to me. I bet this is next to the Warick?? Hotel.

"Immer, Ingrid" <Ingrid.Immer@Williams.com> on 12/21/2000 11:48:47 AM

To: "'chris.germany@enron.com'" <chris.germany@enron.com>

cc:

Subject: About St Pauls

<<About St Pauls.url>>

?

?http://www.stpaulshouston.org/about.html

Chris,

I like the looks of this place.? What do you think about going here Christmas eve?? They have an 11:00 a.m. service and a candlelight service at 5:00 p.m., among others.

Let me know.?? ii

- About St Pauls.url

');

INSERT INTO email([from],[to],subject,body) VALUES('nas@cpuc.ca.gov', 'skatz@sempratrading.com, kmccrea@sablaw.com, thompson@wrightlaw.com,', 'Reply Brief filed July 31, 2000', '- CPUC01-#76371-v1-Revised_Reply_Brief__Due_today_7_31_.doc');

INSERT INTO email([from],[to],subject,body) VALUES('gascontrol@aglresources.com', 'dscott4@enron.com, lcampbel@enron.com', 'Alert Posted 10:00 AM November 20,2000: E-GAS Request Reminder', 'Alert Posted 10:00 AM November 20,2000: E-GAS Request Reminder

As discussed in the Winter Operations Meeting on Sept.29,2000,

E-Gas(Emergency Gas) will not be offered this winter as a service from AGLC.

Marketers and Poolers can receive gas via Peaking and IBSS nominations(daisy chain) from other marketers up to the 6 p.m. Same Day 2 nomination cycle.

');

INSERT INTO email([from],[to],subject,body) VALUES('dutch.quigley@enron.com', 'rwoikwitz@powermerchants.com', ', ')

Here is a goody for you');

INSERT INTO email([from],[to],subject,body) VALUES('ryan.o.rourke@enron.com', 'k..allen@enron.com, randy.bhatia@enron.com, frank.ermis@enron.com,', 'TRV Notification: (West VaR - 11/07/2001)', 'The report named: West VaR

<http://trv.corp.enron.com/linkFromExcel.asp?report_cd=36&report_name=West+VaR&category_cd=2&category_name=WEST&toc_hide=1&sTV1=2&TV1Exp=Y¤t_efct_date=11/07/2001>, published as of 11/07/2001 is now available for viewing on the website.');

INSERT INTO email([from],[to],subject,body) VALUES('mjones7@txu.com', 'cstone1@txu.com, gggreen2@txu.com, timpowell@txu.com,', 'Enron / HPL Actuals for July 10, 2000', 'Teco Tap 10.000 / Enron ; 110.000 / HPL IFERC

LS HPL LSK IC 30.000 / Enron

');

INSERT INTO email([from],[to],subject,body) VALUES('susan.pereira@enron.com', 'kkw816@aol.com', 'soccer practice', 'Kathy-

Is it safe to assume that practice is cancelled for

tonight??

Susan Pereira');

INSERT INTO email([from],[to],subject,body) VALUES('mark.whitt@enron.com', 'barry.tycholiz@enron.com', 'Huber Internal Memo', 'Please look at this. I didn"t know how deep to go with the desk. Do you think this works.

');

INSERT INTO email([from],[to],subject,body) VALUES('m..forney@enron.com', 'george.phillips@enron.com', '', 'George,
Give me a call and we will further discuss opportunities on the 13st floor.

Thanks,

JMForney

3-7160');

INSERT INTO email([from],[to],subject,body) VALUES('brad.mckay@enron.com', 'angusmcka@aol.com', 'Re: (no subject)', 'not yet');

INSERT INTO email([from],[to],subject,body) VALUES('adam.bayer@enron.com', 'jonathan.mckay@enron.com', 'FW: Curve Fetch File', 'Here is the curve fetch file sent to me. It has plenty of points in it. If you give me a list of which ones you need we may be able to construct a secondary worksheet to vlookup the values.

adam

35227

-----Original Message-----

From: Royed, Jeff

Sent: Tuesday,

September 25, 2001 11:37 AM

To: Bayer, Adam

Subject: Curve Fetch File

Let me know if it works. It may be required to have a certain version of Oracle for it to work properly.

Jeff Royed

Enron

Energy Operations

Phone: 713-853-5295');

INSERT INTO email([from],[to],subject,body) VALUES('matt.smith@enron.com', 'yan.wang@enron.com', 'Report Formats', 'Yan,

The merged reports look great. I believe the only orientation changes are to "unmerge" the following six reports:

31 Keystone Receipts

15 Questar Pipeline

40 Rockies Production

22 West_2
23 West_3
25 CIG_WIC

The orientation of the individual reports should be correct. Thanks.

Mat

PS. Just a reminder to add the "*" by the title of calculated points.);
INSERT INTO email([from],[to],subject,body) VALUES('michelle.lokay@enron.com', 'jimboman@bigfoot.com',
'Egyptian Festival', '----- Forwarded by Michelle Lokay/ET&S/Enron on 09/07/2000
10:08 AM -----')

"Karkour, Randa" <Randa.Karkour@COMPAQ.com>
on 09/07/2000 09:01:04 AM
To: ""Agheb (E-mail)" <Agheb@aol.com>, "Leila Mankarious (E-mail)"
<Leila_Mankarious@mhhs.org>, ""Marymankarious (E-mail)"
<marymankarious@aol.com>, "Michelle lokay (E-mail)" <mlokay@enron.com>, "Ramy
Mankarious (E-mail)" <Mankarious@aol.com>
cc:

Subject: Egyptian Festival

<<Egyptian Festival.url>>

<http://www.egyptianfestival.com/>

- Egyptian Festival.url

);

INSERT INTO email([from],[to],subject,body) VALUES('errol.mclaughlin@enron.com',
'sherry.dawson@enron.com', 'Urgent!!! --- New EAST books', 'This has to be done.....')

Thanks

----- Forwarded by Errol McLaughlin/Corp/Enron on 12/20/2000
08:39 AM -----

From: William Kelly @ ECT 12/20/2000 08:31 AM

To: Kam Keiser/HOU/ECT@ECT, Darron C Giron/HOU/ECT@ECT, David
Baumbach/HOU/ECT@ECT, Errol McLaughlin/Corp/Enron@ENRON
cc: Kimat Singla/HOU/ECT@ECT, Kulvinder Fowler/NA/Enron@ENRON,
Kyle R
Lilly/HOU/ECT@ECT, Jeff Royed/Corp/Enron@ENRON, Alejandra

Chavez/NA/Enron@ENRON, Crystal Hyde/HOU/ECT@ECT

Subject: New EAST books

We have new book names in TAGG for our intramonth portfolios and it is extremely important that any deal booked to the East is communicated quickly to someone on my team. I know it will take some time for the new names to sink in and I do not want us to miss any positions or P&L.

Thanks for your help on this.

New:

Scott Neal : East Northeast

Dick Jenkins: East Marketeast

WK

');

INSERT INTO email([from],[to],subject,body) VALUES('david.forster@enron.com', 'eol.wide@enron.com', 'Change to Stack Manager', 'Effective immediately, there is a change to the Stack Manager which will affect any Inactive Child.

An inactive Child with links to Parent products will not have their calculated prices updated until the Child product is Activated.

When the Child Product is activated, the price will be recalculated and updated BEFORE it is displayed on the web.

This means that if you are inputting a basis price on a Child product, you will not see the final, calculated price until you Activate the product, at which time the customer will also see it.

If you have any questions, please contact the Help Desk on:

Americas: 713 853 4357

Europe: + 44 (0) 20 7783 7783

Asia/Australia: +61 2 9229 2300

Dave');

INSERT INTO email([from],[to],subject,body) VALUES('vince.kaminski@enron.com', 'jhh1@email.msn.com', 'Re: Light reading - see pieces beginning on page 7', 'John,

I saw it. Very interesting.

Vince

"John H Herbert" <jhh1@email.msn.com> on 07/28/2000 08:38:08 AM
To: "Vince J Kaminski" <Vince_J_Kaminski@enron.com>
cc:
Subject: Light reading - see pieces beginning on page 7

Cheers and have a nice weekend,

JHHerbert

- gd000728.pdf

);
INSERT INTO email([from],[to],subject,body) VALUES('matthew.lenhart@enron.com',
'mmmarcotel@equiva.com', 'RE:', 'i will try to line up a pig for you ');
INSERT INTO email([from],[to],subject,body)
VALUES('jae.black@enron.com', 'claudette.harvey@enron.com, chaun.roberts@enron.com,
judy.martinez@enron.com,', 'Disaster Recovery Equipment', 'As a reminder...there are several pieces of equipment
that are set up on the 30th Floor, as well as on our floor, for the Disaster Recovery Team. PLEASE DO NOT
TAKE, BORROW OR USE this equipment. Should you need to use another computer system, other than yours, or
make conference calls please work with your Assistant to help find or set up equipment for you to use.

Thanks for your understanding in this matter.

T.Jae Black

East Power Trading

Assistant to Kevin Presto

off. 713-853-5800

fax 713-646-8272

cell 713-539-4760);

INSERT INTO email([from],[to],subject,body) VALUES('eric.bass@enron.com', 'dale.neuner@enron.com', '5 X
24', 'Dale,

Have you heard anything more on the 5 X 24s? We would like to get this
product out ASAP.

Thanks,

Eric');

INSERT INTO email([from],[to],subject,body) VALUES('messenger@smartreminders.com',
'm..tholt@enron.com', '10% Coupon - PrintPal Printer Cartridges - 100% Guaranteed', '[IMAGE]
[IMAGE][IMAGE][IMAGE]

Dear SmartReminders Member,

[IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE]

We respect your privacy and are a Certified Participant of the BBBOnLine
Privacy Program. To be removed from future offers,click here.

SmartReminders.com is a permission based service. To unsubscribe click here . ');

INSERT INTO email([from],[to],subject,body) VALUES('benjamin.rogers@enron.com',
'mark.bernstein@enron.com', ", 'The guy you are talking about left CIN under a "cloud of suspicion" sort of
speak. He was the one who got into several bad deals and PPA's in California
for CIN, thus he left on a bad note. Let me know if you need more detail
than that, I felt this was the type of info you were looking for. Thanks!

Ben');

INSERT INTO email([from],[to],subject,body)

VALUES('enron_update@concreworkplace.com', 'michelle.cash@enron.com', 'Expense Report Receipts Not
Received', 'Employee Name: Michelle Cash
Report Name: Houston Cellular 8-11-01
Report Date: 12/13/01
Report ID: 594D37C9ED2111D5B452
Submitted On: 12/13/01

You are only allowed 2 reports with receipts outstanding. Your expense reports will not be paid until you meet this
requirement.');

INSERT INTO email([from],[to],subject,body) VALUES('susan.mara@enron.com', 'ray.alvarez@enron.com,
mark.palmer@enron.com, karen.denne@enron.com', 'CAISO Emergency Motion -- to discontinue market-based
rates for', 'FYI. the latest broadside against the generators.

Sue Mara
Enron Corp.
Tel: (415) 782-7802
Fax:(415) 782-7854

----- Forwarded by Susan J Mara/NA/Enron on 06/08/2001 12:24 PM -----

"Milner, Marcie" <MMilner@coral-energy.com> 06/08/2001 11:13 AM To: ""smara@enron.com""
<smara@enron.com> cc: Subject: CAISO Emergency Motion

Sue, did you see this emergency motion
the CAISO filed today? Apparently
they are requesting that FERC discontinue market-based rates immediately and
grant refunds plus interest on the difference between cost-based rates and
market revenues received back to May 2000. They are requesting the
commission act within 14 days. Have you heard anything about what they are
doing?

Marcie

<http://www.caiso.com/docs/2001/06/08/200106081005526469.pdf>

);

INSERT INTO email([from],[to],subject,body) VALUES('fletcher.sturm@enron.com', 'eloy.escobar@enron.com',
'Re: General Brinks Position Meeting', 'Eloy,

Who is General Brinks?

Fletch);

INSERT INTO email([from],[to],subject,body) VALUES('nailia.dindarova@enron.com',
'richard.shapiro@enron.com', 'Documents for Mark Frevert (on EU developments and lessons from', 'Rick,

Here are the documents that Peter has prepared for Mark Frevert.

Nailia

----- Forwarded by Nailia Dindarova/LON/ECT on 25/06/2001

16:36 -----

Nailia Dindarova

25/06/2001 15:36

To:

Michael Brown/Enron@EUEnronXGate

cc: Ross Sankey/Enron@EUEnronXGate, Eric Shaw/ENRON@EUEnronXGate, Peter
Styles/LON/ECT@ECT

Subject: Documents for Mark Frevert (on EU developments and lessons from

California)

Michael,

These are the documents that Peter promised to give to you for Mark Frevert. He has now handed them to him in person but asked me to transmit them electronically to you, as well as Eric and Ross.

Nailia

);

```
INSERT INTO email([from],[to],subject,body) VALUES('peggy.a.kostial@accenture.com',  
'dave.samuels@enron.com', 'EOL-Accenture Deal Sheet', 'Dave -
```

Attached are our comments and suggested changes. Please call to review.

On the time line for completion, we have four critical steps to complete:

- Finalize market analysis to refine business case, specifically
projected revenue stream

- Complete counterparty surveying, including targeting 3 CPs for letters
of intent

- Review Enron asset base for potential reuse/ licensing

- Contract
negotiations

Joe will come back to us with an updated time line, but it is my expectation that we are still on the same schedule (we just begun week three) with possibly a week or so slippage.....contract negotiations will probably be the critical path.

We will send our cut at the actual time line here shortly. Thanks,

Peggy

(See attached file: accenture-dealpoints v2.doc)

- accenture-dealpoints v2.doc ');

```
INSERT INTO email([from],[to],subject,body) VALUES('thomas.martin@enron.com', 'thomas.martin@enron.com',  
'Re: Guadalupe Power Partners LP', '----- Forwarded by Thomas A Martin/HOU/ECT on 03/20/2001  
03:49 PM -----
```

Thomas A Martin

10/11/2000 03:55 PM

To: Patrick Wade/HOU/ECT@ECT
cc:
Subject: Re: Guadalupe Power Partners LP

The deal is physically served at Oasis Waha or Oasis Katy and is priced at either HSC, Waha or Katytailgate GD at buyers option three days prior to NYMEX close.

');

INSERT INTO email([from],[to],subject,body)

VALUES('judy.townsend@enron.com', 'dan.junek@enron.com, chris.germany@enron.com', 'Columbia Distribution's Capacity Available for Release - Sum', '----- Forwarded by Judy Townsend/HOU/ECT on 03/09/2001 11:04

AM -----

agoddard@nsource.com on 03/08/2001 09:16:57 AM

To: " - *Koch, Kent" <kkoch@nsource.com>, " -
*Millar, Debra" <dmillar@nsource.com>, " - *Burke, Lynn"
<lburke@nsource.com>
cc: " - *Heckathorn, Tom" <heckathorn@nsource.com>
Subject: Columbia Distribution's Capacity Available for Release - Sum

Attached is Columbia Distribution's notice of capacity available for release for the summer of 2001 (Apr. 2001 through Oct. 2001).

Please note that the deadline for bids is 3:00pm EST on March 20, 2001.

If you have any questions, feel free to contact any of the representatives listed at the bottom of the attachment.

Aaron Goddard

- 2001Summer.doc

');

INSERT INTO

email([from],[to],subject,body) VALUES('rhonda.denton@enron.com', 'tim.belden@enron.com, dana.davis@enron.com, genia.fitzgerald@enron.com,', 'Split Rock Energy LLC', 'We have received the executed EEI contract from this CP dated 12/12/2000.

Copies will be distributed to Legal and Credit.');

INSERT INTO email([from],[to],subject,body) VALUES('kerrymcelroy@dwt.com', 'jack.speer@alcoa.com, crow@millernash.com, michaelearly@earthlink.net,', 'Oral Argument Request', ' - Oral Argument Request.doc');

INSERT INTO email([from],[to],subject,body) VALUES('mike.carson@enron.com', 'rlmichaelis@hormel.com', ",
'Did you come in town this wk end..... My new number at our house is :
713-668-3712..... my cell # is 281-381-7332

the kid');

INSERT INTO email([from],[to],subject,body) VALUES('cooper.richey@enron.com', 'trycooper@hotmail.com',
'FW: Contact Info', '

-----Original Message-----

From: Punja, Karim
Sent: Thursday, December 13, 2001 2:35 PM
To: Richey, Cooper
Subject: Contact Info

Cooper,

Its

been a real pleasure working with you (even though it was for only a small amount of time)
I hope we can stay in touch.

Home# 234-0249
email: kpunja@hotmail.com

Take Care,

Karim.

');

INSERT INTO email([from],[to],subject,body) VALUES('bjm30@earthlink.net', 'mcguinn.k@enron.com,
mcguinn.ian@enron.com, mcguinn.stephen@enron.com,', 'email address change', 'Hello all.

I haven't talked to many of you via email recently but I do want to give you
my new address for your email file:

bjm30@earthlink.net

I hope all is well.

Brian McGuinn');

INSERT INTO email([from],[to],subject,body) VALUES('shelley.corman@enron.com', 'steve.hotte@enron.com',
'Flat Panels', 'Can you please advise what is going on with the flat panels that we had planned to distribute to our gas
logistics team. It was in the budget and we had the okay, but now I'm hearing there is some hold-up & the units are
stored on 44.

Shelley');

INSERT INTO email([from],[to],subject,body) VALUES('sara.davidson@enron.com',
'john.schwartzenburg@enron.com, scott.dieball@enron.com, recipients@enron.com,', '2001 Enron Law Conference
(Distribution List 2)', ' Enron Law Conference

San Antonio, Texas May 2-4, 2001 Westin Riverwalk

See attached memo for more details!!

? Registration for the law conference this year will be handled through an Online RSVP Form on the Enron Law Conference Website at <http://lawconference.corp.enron.com>. The website is still under construction and will not be available until Thursday, March 15, 2001.

? We will send you another e-mail to confirm when the Law Conference Website is operational.

? Please complete the Online RSVP Form as soon as it is available and submit it no later than Friday, March 30th.

');

INSERT INTO email([from],[to],subject,body) VALUES('tori.kuykendall@enron.com', 'heath.b.taylor@accenture.com', 'Re:', 'hey - thats funny about john - he definitely remembers him - i"ll call pat and let him know - we are coming on saturday - i just havent had a chance to call you guys back -- looking forward to it -- i probably need the directions again though');

INSERT INTO email([from],[to],subject,body) VALUES('darron.giron@enron.com', 'bryce.baxter@enron.com', 'Re: Feedback for Audrey Cook', 'Bryce,

I"ll get it done today.

DG 3-9573

From: Bryce Baxter 06/12/2000 07:15 PM

To: Darron C Giron/HOU/ECT@ECT

cc:

Subject: Feedback for Audrey Cook

You were identified as a reviewer for Audrey Cook. If possible, could you complete her feedback by end of business Wednesday? It will really help me in the PRC process to have your input. Thanks.

);
INSERT INTO email([from],[to],subject,body) VALUES('casey.evans@enron.com', 'stephanie.sever@enron.com',
'Gas EOL ID', 'Stephanie,

In conjunction with the recent movement of several power traders, they are changing the names of their gas books as well. The names of the new gas books and traders are as follows:

PWR-NG-LT-SPP:

Mike Carson

PWR-NG-LT-SERC: Jeff King

If you need to know their power desk to map their ID to their gas books, those desks are as follows:

EPMI-LT-SPP: Mike Carson

EPMI-LT-SERC: Jeff King

I will be in training this afternoon, but will be back when class is over. Let me know if you have any questions.

Thanks for your help!

Casey');

INSERT INTO email([from],[to],subject,body) VALUES('darrell.schoolcraft@enron.com',
'david.roensch@enron.com, kimberly.watson@enron.com, michelle.lokay@enron.com,', 'Postings', 'Please see the
attached.

ds

);

INSERT INTO email([from],[to],subject,body) VALUES('mcominsky@aol.com', 'cpatman@bracepatt.com,
james_derrick@enron.com', 'Jurisprudence Luncheon', 'Carrin & Jim --

It was an honor and a pleasure to meet both of you yesterday. I know we will have fun working together on this very special event.

Jeff left the jurisprudence luncheon lists for me before he left on vacation.

I wasn't sure whether he transmitted them

to you as well. Would you please

advise me if you would like them sent to you? I can email the MS Excel files or I can fax the hard copies to you. Please advise what is most convenient.

I plan to be in town through the holidays and can be reached by phone, email, or cell phone at any time. My cell phone number is 713/705-4829.

Thanks again for your interest in the ADL's work. Martin.

Martin B. Cominsky
Director, Southwest Region
Anti-Defamation League
713/627-3490, ext. 122
713/627-2011 (fax)
MCominsky@aol.com');

INSERT INTO email([from],[to],subject,body) VALUES('phillip.love@enron.com', 'todagost@utmb.edu, gbsonnta@utmb.edu', 'New President', 'I had a little bird put a word in my ear. Is there any possibility for Ben Raimer to be Bush's secretary of HHS? Just curious about that infamous UTMB rumor mill. Hope things are well, happy holidays.

PL');

INSERT INTO email([from],[to],subject,body) VALUES('marie.heard@enron.com', 'ehamilton@fna.com', 'ISDA Master Agreement',
'Erin:

Pursuant to your request, attached are the Schedule to the ISDA Master Agreement, together with Paragraph 13 to the ISDA Credit Support Annex. Please let me know if you need anything else. We look forward to hearing your comments.

Marie

Marie Heard
Senior Legal Specialist
Enron North America Corp.
Phone: (713) 853-3907
Fax: (713) 646-3490
marie.heard@enron.com

');

INSERT INTO email([from],[to],subject,body) VALUES('andrea.ring@enron.com', 'beverly.beaty@enron.com', 'Re: Tennessee Buy - Louis Dreyfus', 'Beverly - once again thanks so much for your help on this.

');

INSERT INTO email([from],[to],subject,body) VALUES('karolyn.criado@enron.com', 'j..bonin@enron.com, felicia.case@enron.com, b..clapp@enron.com,', 'Price List week of Oct. 8-9, 2001', '

Please contact me if you have any questions regarding last weeks prices.

Thank you,
Karolyn Criado
3-9441

');

INSERT INTO email([from],[to],subject,body)

VALUES('kevin.presto@enron.com', 'edward.baughman@enron.com, billy.braddock@enron.com', 'Associated',
'Please begin working on filling our Associated short position in 02. I would like to take this risk off the books.

In addition, please find out what a buy-out of VEPCO would cost us. With Rogers transitioning to run our retail risk management, I would like to clean up our customer positions.

We also need to continue to explore a JEA buy-out.

Thanks.');

INSERT INTO email([from],[to],subject,body) VALUES('stacy.dickson@enron.com', 'gregg.penman@enron.com',
'RE: Constellation TC 5-7-01', 'Gregg,

I am at home with a sick baby. (Lots of fun!) I will call you about this tomorrow.

Stacy');

INSERT INTO email([from],[to],subject,body) VALUES('joe.quenet@enron.com', 'dfincher@utilicorp.com', ", 'hey
big guy.....check this out.....

w ww.gorelieberman-2000.com/');

INSERT INTO email([from],[to],subject,body) VALUES('k..allen@enron.com', 'jacqestc@aol.com', ",
'Jacques,

I sent you a fax of Kevin Kolb's comments on the release. The payoff on the note would be \$36,248 (\$36090(principal) + \$158 (accrued interest)).

This is assuming we wrap this up on Tuesday.

Please email to confirm that their changes are ok so I can set up a meeting on Tuesday to reach closure.

Phillip');

INSERT INTO email([from],[to],subject,body) VALUES('kourtney.nelson@enron.com',
'mike.swerzbin@enron.com', 'Adjusted L/R Balance', 'Mike,

I placed the adjusted L/R Balance on the Enronwest site. It is under the "Staff/Kourtney Nelson". There are two links:

- 1) "Adj L_R" is the same data/format from the weekly strategy meeting.
- 2) "New Gen 2001_2002" link has all of the supply side info that is used to calculate the L/R balance
-Please note the Data Flag column, a value of "3" indicates the project was cancelled, on hold, etc and is not included in the calc.

Both of these sheets are interactive Excel spreadsheets and thus you can play around with the data as you please. Also, James Bruce is working to get his gen report on the web. That will help with your access to information on new gen.

Please let me know if you have any questions or feedback,

Kourtney

Kourtney Nelson

Fundamental Analysis

Enron North America

(503) 464-8280

kourtney.nelson@enron.com');

INSERT INTO email([from],[to],subject,body) VALUES('d.thomas@enron.com', 'naveed.ahmed@enron.com',
'FW: Current Enron TCC Portfolio', '

-----Original Message-----

From: Grace, Rebecca M.

Sent: Monday, December 17, 2001 9:44 AM

To: Thomas, Paul D.

Cc: Cashion, Jim; Allen, Thresa A.; May, Tom

Subject: RE: Current Enron TCC Portfolio

Paul,

I reviewed NY's list. I agree with all of their contracts numbers and mw amounts.

Call if you have any more questions.

Rebecca

-----Original Message-----

From: Thomas, Paul D.

Sent: Monday, December 17, 2001 9:08 AM

To: Grace, Rebecca M.

Subject: FW: Current Enron TCC Portfolio

<< File: enrntccs.xls >>

Rebecca,

Let me know if

you see any differences.

Paul

X 3-0403

-----Original Message-----

From: Thomas, Paul D.

Sent: Monday, December 17, 2001 9:04 AM

To: Ahmed, Naveed

Subject: FW: Current Enron TCC Portfolio

-----Original Message-----

From: Thomas, Paul D.
Sent: Thursday, December 13, 2001 10:01 AM
To: Baughman, Edward D.
Subject: Current Enron TCC Portfolio

);
INSERT INTO email([from],[to],subject,body) VALUES('stephanie.panus@enron.com',
'william.bradford@enron.com, debbie.brackett@enron.com,', 'Coastal Merchant Energy/El Paso Merchant Energy',
'Coastal Merchant Energy, L.P. merged with and into El Paso Merchant Energy,
L.P., effective February 1, 2001, with the surviving entity being El Paso
Merchant Energy, L.P. We currently have ISDA Master Agreements with both
counterparties. Please see the attached memo regarding the existing Masters
and let us know which agreement should be terminated.

Thanks,
Stephanie

);
INSERT INTO email([from],[to],subject,body) VALUES('kam.keiser@enron.com',
'c..kenne@enron.com', 'RE: What about this too???' , '

-----Original Message-----

From: Kenne, Dawn C.
Sent: Wednesday, February 06, 2002 11:50 AM
To: Keiser, Kam
Subject: What about this too???

<< File: Netco Trader Matrix.xls >>

);
INSERT INTO email([from],[to],subject,body) VALUES('chris.meyer@enron.com', 'joe.parks@enron.com',
'Centana', 'Talked to Chip. We do need Cash Committe approval given the netting feature of your deal, which
means Batch Funding Request. Please update per my previous e-mail and forward.

Thanks

chris
x31666');
INSERT INTO email([from],[to],subject,body) VALUES('debra.perlingiere@enron.com',
'jworman@academyofhealth.com', ', 'Have a great weekend! Happy Fathers Day!

Debra Perlingiere

Enron North America Corp.
1400 Smith Street, EB 3885
Houston, Texas 77002
dperlin@enron.com
Phone 713-853-7658
Fax 713-646-3490);

INSERT INTO email([from],[to],subject,body) VALUES('outlook.team@enron.com', '', 'Demo by Martha Janousek of Dashboard & Pipeline Profile / Julia &', 'CALENDAR ENTRY: APPOINTMENT

Description:

Demo by Martha Janousek of Dashboard & Pipeline Profile / Julia & Dir Rpts. - 4102

Date: 1/5/2001

Time: 9:00 AM - 10:00 AM (Central Standard Time)

Chairperson: Outlook Migration Team

Detailed Description:');

INSERT INTO email([from],[to],subject,body) VALUES('diana.seifert@enron.com', 'mark.taylor@enron.com', 'Guest access Chile', 'Hello Mark,

Justin Boyd told me that your can help me with questions regarding Chile.

We got a request for guest access through MG.

The company is called Escondida and is a subsidiary of BHP Australia.

Please advise if I can set up a guest account or not.

F.Y.I.: MG is planning to put a "in w/h Chile" contract for Copper on-line as soon as Enron has done the due diligence for this country.

Thanks !

Best regards

Diana Seifert

EOL PCG');

INSERT INTO email([from],[to],subject,body) VALUES('enron_update@concuere workplace.com', 'mark.whitt@enron.com', '<<Concur Expense Document>> - 121001',

'The Approval status has changed on the following report:

Status last changed by: Barry L. Tycholiz

Expense Report Name: 121001

Report Total: \$198.98

Amount Due Employee: \$198.98

Amount Approved: \$198.98

Amount Paid: \$0.00

Approval Status: Approved

Payment Status: Pending

To review this expense report, click on the following link for Concur Expense.

<http://expense.ms.enron.com>);

INSERT INTO email([from],[to],subject,body) VALUES('kevin.hyatt@enron.com', ' ', 'Technical Support', 'Outside the U.S.', please refer to the list below:

Australia:

1800 678-515

support@palm-au.com

Canada:

1905 305-6530

support@palm.com

New Zealand:

0800 446-398

support@palm-nz.com

U.K.:

0171 867 0108

eurosupport@palm.3com.com

Please refer to the Worldwide Customer Support card for a complete technical support contact list.');

INSERT INTO email([from],[to],subject,body) VALUES('geoff.storey@enron.com', 'dutch.quigley@enron.com', 'RE:', 'duke contact?')

-----Original Message-----

From: Quigley, Dutch

Sent: Wednesday, October 31, 2001 10:14 AM

To: Storey, Geoff

Subject: RE:

bp corp Albert LaMore 281-366-4962

running the reports now

-----Original Message-----

From: Storey, Geoff

Sent: Wednesday, October 31, 2001 10:10 AM

To: Quigley, Dutch

Subject: RE:

give me a contact over there too

BP

-----Original Message-----

From: Quigley, Dutch
Sent: Wednesday, October 31, 2001 9:42 AM
To: Storey, Geoff
Subject:

Coral Jeff Whitnah 713-767-5374

Relaint Steve McGinn 713-207-4000');

INSERT INTO email([from],[to],subject,body) VALUES('pete.davis@enron.com', 'pete.davis@enron.com', 'Start Date: 4/22/01; HourAhead hour: 3; <CODESITE>', 'Start Date: 4/22/01; HourAhead hour: 3; No ancillary schedules awarded.

Variances detected.

Variances detected in Load schedule.

LOG MESSAGES:

PARSING FILE -->> O:\Portland\WestDesk\California Scheduling\ISO Final Schedules\2001042203.txt

---- Load Schedule ----

\$\$\$ Variance found in table tblLoads.

Details: (Hour: 3 / Preferred:

1.92 / Final: 1.89)

TRANS_TYPE: FINAL

LOAD_ID: PGE4

MKT_TYPE: 2

TRANS_DATE: 4/22/01

SC_ID: EPMI

');

INSERT INTO email([from],[to],subject,body) VALUES('john.postlethwaite@enron.com', 'john.zufferli@enron.com', 'Reference', 'John, hope things are going well up there for you. The big day is almost here for you and Jessica. I was wondering if I could use your name as a job reference if need be. I am just trying to get everything in order just in case something happens.

John');

INSERT INTO email([from],[to],subject,body) VALUES('jeffrey.shankman@enron.com', 'Ischiffm@jonesday.com', 'Re:', 'I saw you called on the cell this a.m. Sorry I missed you. (I was in the shower). I have had a shitty week--I suspect my silence (not only to you, but others) after our phone call is a result of the week. I'm seeing Glen at 11:15....talk to you');

INSERT INTO email([from],[to],subject,body) VALUES('litebytz@enron.com', ', 'Lite Bytz RSVP', 'This week's Lite Bytz presentation will feature the following TOOLZ speaker:

Richard McDougall

Solaris 8

Thursday, June 7, 2001

If you have not already signed up, please RSVP via email to litebytz@enron.com by the end of the day Tuesday, June 5, 2001.

*Remember: this is now a Brown Bag Event--so bring your lunch and we will provide cookies and drinks.

Click below for more details.

<http://home.enron.com:84/messaging/litebytztoolzprint.jpg>);

```
    COMMIT;
  }
} {}
```

```
#####
# Everything above just builds an interesting test database.  The actual
# tests come after this comment.
#####
```

```
do_test fts2c-1.2 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark'
  }
} {6 17 25 38 40 42 73 74}
do_test fts2c-1.3 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'susan'
  }
} {24 40}
do_test fts2c-1.4 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark
susan'
  }
} {40}
do_test fts2c-1.5 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'susan mark'
  }
} {40}
do_test fts2c-1.6 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH "'mark susan'"
  }
} {}
do_test fts2c-1.7 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark -susan'
```

```

}
} {6 17 25 38 42 73 74}
do_test fts2c-1.8 {
execsql {
    SELECT rowid FROM email WHERE email MATCH '-mark susan'
}
} {24}
do_test fts2c-1.9 {
execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark OR susan'
}
} {6 17 24 25 38 40 42 73 74}

# Some simple tests of the automatic "offsets(email)" column. In the sample
# data set above, only one message, number 20, contains the words
# "gas" and "reminder" in both body and subject.
#
do_test fts2c-2.1 {
execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE email MATCH 'gas reminder'
}
} {20 {2 0 42 3 2 1 54 8 3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}
do_test fts2c-2.2 {
execsql {

    SELECT rowid, offsets(email) FROM email
    WHERE email MATCH 'subject:gas reminder'
}
} {20 {2 0 42 3 2 1 54 8 3 1 54 8}}
do_test fts2c-2.3 {
execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE email MATCH 'body:gas reminder'
}
} {20 {2 1 54 8 3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}
do_test fts2c-2.4 {
execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE subject MATCH 'gas reminder'
}
} {20 {2 0 42 3 2 1 54 8}}
do_test fts2c-2.5 {
execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE body MATCH 'gas reminder'
}
} {20 {3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}

```

```

# Document 32 contains 5 instances of the word "child". But only
# 3 of them are paired with "product". Make sure only those instances
# that match the phrase appear in the offsets(email) list.
#
do_test fts2c-3.1 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE body MATCH 'child product' AND +rowid=32
  }
} {32 {3 0 94 5 3 0 114 5 3 0
207 5 3 1 213 7 3 0 245 5 3 1 251 7 3 0 409 5 3 1 415 7 3 1 493 7}}
do_test fts2c-3.2 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE body MATCH "child product"
  }
} {32 {3 0 207 5 3 1 213 7 3 0 245 5 3 1 251 7 3 0 409 5 3 1 415 7}}

# Snippet generator tests
#
do_test fts2c-4.1 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'subject:gas reminder'
  }
} {{Alert Posted 10:00 AM November 20,2000: E-<b>GAS</b> Request <b>Reminder</b>}}
do_test fts2c-4.2 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'christmas candlelight'
  }
} {{<b>...</b> place.? What do you think about going here <b>Christmas</b>
eve?? They have an 11:00 a.m. service and a <b>candlelight</b> service at 5:00 p.m.,
among others. <b>...</b>}}

do_test fts2c-4.3 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'deal sheet potential reuse'
  }
} {{EOL-Accenture <b>Deal</b> <b>Sheet</b> <b>...</b> intent
Review Enron
asset base for <b>potential</b> <b>reuse</b>/ licensing
Contract negotiations <b>...</b>}}
do_test fts2c-4.4 {
  execsql {
    SELECT snippet(email,'<<<','>>>',') FROM email

```

```

WHERE email MATCH 'deal sheet potential reuse'
}
} {{EOL-Accenture <<<Deal>>> <<<Sheet>>> intent
Review Enron asset base for <<<potential>>> <<<reuse>>>/ licensing
Contract negotiations }}
do_test fts2c-4.5 {
execsql {
SELECT snippet(email,'<<<,>>>',') FROM email
WHERE email MATCH 'first things'
}
} {{Re: <<<First>>> Polish Deal! Congrats! <<<Things>>> seem to be building rapidly now on the }}
do_test fts2c-4.6 {
execsql {
SELECT snippet(email) FROM email
WHERE email MATCH 'chris is here'
}
} {{<b>chris</b>.germany@enron.com <b>...</b> Sounds good to me. I bet this <b>is</b> next to the Warick??
Hotel. <b>...</b> place.? What do you think about going <b>here</b> Christmas
eve?? They have an 11:00 a.m. <b>...</b>}}
do_test fts2c-4.7 {
execsql {
SELECT
snippet(email) FROM email
WHERE email MATCH "'pursuant to'"
}
} {{Erin:

<b>Pursuant</b> <b>to</b> your request, attached are the Schedule to <b>...</b>}}
do_test fts2c-4.8 {
execsql {
SELECT snippet(email) FROM email
WHERE email MATCH 'ancillary load davis'
}
} {{pete.<b>davis</b>@enron.com <b>...</b> Start Date: 4/22/01; HourAhead hour: 3; No <b>ancillary</b>
schedules awarded.
Variances detected.
Variances detected in <b>Load</b> schedule.

LOG MESSAGES:

PARSING <b>...</b>}}

# Combinations of AND and OR operators:
#
do_test fts2c-5.1 {
execsql {
SELECT snippet(email) FROM email
WHERE email MATCH 'questar enron OR com'

```

```
}  
} {{matt.smith@<b>enron</b>.<b>com</b> <b>...</b> six reports:
```

31 Keystone Receipts

15 Questar Pipeline

40 Rockies Production

22 West_2 ...}}

```
do_test fts2c-5.2 {
```

```
  execsql {
```

```
    SELECT snippet(email) FROM email
```

```
    WHERE email MATCH 'enron OR com questar'
```

```
  }
```

```
} {{matt.smith@<b>enron</b>.<b>com</b> <b>...</b>
```

```
six reports:
```

31 Keystone Receipts

15 Questar Pipeline

40 Rockies Production

22 West_2 ...}}

finish_test

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/test/fts2c.test
```

No license file was found, but licenses were detected in source scan.

public domain and so many people use it

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/famous.html
```

No license file was found, but licenses were detected in source scan.

SQLite core and like the SQLite core are in the public domain. The

The TH3 test harness is a set of proprietary tests, written in

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/testing.html
```

No license file was found, but licenses were detected in source scan.

<html>

<body bgcolor="white">

<p>FOR IMMEDIATE RELEASE:</p>

<h2 align="center">SQLite Consortium Launches With Mozilla And Symbian As Charter Members</h2>

Ensures independent technical direction for world's most deployed SQL database engine

Charlotte, North Carolina - December 12, 2007 - The SQLite Consortium, a new membership association dedicated to maintaining SQLite as a fully open and independent product, was formally announced today. Mozilla and Symbian Ltd. have joined the SQLite Consortium as charter members.

SQLite is a compact, high efficiency, high reliability, embeddable SQL database engine. The source code to SQLite is in the public domain and is available with no associated fees. SQLite is the most deployed SQL database engine in the world and is currently used in a wide range of commercial software products and electronic devices from leading manufacturers.

SQLite is found today in many mobile phones, MP3 players, set-top boxes, and PCs.

The mission of the SQLite Consortium is to continue developing and enhancing SQLite as a product that anyone may use without paying royalties or licensing fees. Members of the SQLite Consortium provide funding to enable this mission and in return receive enterprise-level technical support. Technical control and direction of SQLite remains entirely with the SQLite developers.

Mozilla, developer of the popular open-source Firefox web browser, and Symbian, the market-leading open operating system for advanced data-enabled smartphones, both deploy the SQLite database engine in their products. As charter members of the Consortium, Mozilla and Symbian are ensuring the development and support of SQLite as a freely accessible and public domain software asset.

"SQLite has become a popular embedded database because it is lightweight, fast, and open source," said Michael Schroepfer, Vice President of Engineering, Mozilla.

"As a charter member of the SQLite Consortium, Mozilla is excited to help ensure SQLite remains a vibrant and open technology, in line with our mission to promote choice and innovation on the Internet."

"The SQLite Consortium will help set the standards for database management which are essential in smartphone functionality and will also help create a pool of developers, highly-skilled in SQLite for future mobile phone development," said Bruce Carney, Director, Developer Programmes & Services, Symbian.

"Our involvement with the SQL Consortium not only demonstrates Symbian's commitment to open standards in the industry, but as mobile phones become increasingly powerful and smartphones become increasingly popular, we are focused on ensuring that desktop developers, who move to the mobile space, have the easiest and most productive experience possible."

SQLite is a winner of the 2005 Google/O'Reilly Open Source Award. Additional information

regarding the SQLite Consortium is available at the SQLite website,
<http://www.sqlite.org/>.

<center>

</center>

<p>About SQLite</p>

<p>SQLite is a software library that implements a self-contained, embeddable, serverless, zero-configuration, transactional SQL database engine. The code for SQLite is in the public domain and is free for any use, commercial or private. SQLite is currently found in countless software titles and electronic devices.</p>

<p>SQLite was originally developed and released 2000 by Dr. D. Richard Hipp. The code continues to be maintained and enhanced by an international team of developers under Hipp's direction.</p>

<p>
CONTACT INFORMATION:

SQLite Consortium

Dr. D. Richard Hipp

6200 Maple Cove Lane

Charlotte, NC 28269

Email: drh@sqlite.org

<http://www.sqlite.org/>

Tel: +1.704.948.4565
</p>

<p>About Mozilla</p>

<p>Mozilla is a global community dedicated to building free, open source products and technologies that improve the online experience for people everywhere. Mozilla works in the open with a highly disciplined, transparent and cooperative development process, under the umbrella of the non-profit Mozilla Foundation. As a wholly owned subsidiary, the Mozilla Corporation organizes the development and marketing of Mozilla products. This unique structure has enabled Mozilla to financially support and cultivate competitive, viable community innovation. For more information, visit www.mozilla.com.</p>

<p>CONTACT INFORMATION:

Mozilla Corporation

Jessica Waight

Tel: +1.415.345.4754

Email: jwaight@outcastpr.com

</p>

<p>About Symbian Limited</p>

<p>Symbian is a software licensing company that develops and licenses Symbian OS, the market-leading open operating system for advanced, data-enabled mobile phones known as smartphones.</p>

<p>Symbian licenses Symbian OS to the world's leading handset manufacturers and has built close co-operative business relationships with leading companies across the mobile industry. During Q3 2007, 20.4 million Symbian smartphones were sold worldwide to over 250 major network operators, bringing the total number of Symbian smartphones shipped up to 30 September 2007 to 165 million.</p>

<p>Symbian has its headquarters in London, United Kingdom, with offices in the United States, United Kingdom, Asia (India, P.R. China, and Korea) and Japan. For more information, please visit www.symbian.com.</p>

<p>CONTACT INFORMATION:

Symbian Global Press Office

Karen Hamblen

+44 207 154 1707

press@symbian.com

</p>

</body></html>

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/pressrelease-20071212.html

No license file was found, but licenses were detected in source scan.

application is free to use the same database connection or the

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/capi3ref.html

No license file was found, but licenses were detected in source scan.

/*

** Return a pointer to the "temporary page" buffer held internally
** by the pager. This is a buffer that is big enough to hold the
** entire content of a database page. This buffer is used internally
** during rollback and will be overwritten whenever a rollback
** occurs. But other modules are free to use it too, as long as
** no rollbacks are happening.

*/

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/src/pager.c

No license file was found, but licenses were detected in source scan.

[public domain](copyright.html).

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/index.html

No license file was found, but licenses were detected in source scan.

SQLite is high-quality, public domain software. The goal of members can also request their own private, proprietary extensions

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/consortium.html

No license file was found, but licenses were detected in source scan.

<html>

<body bgcolor="white">

<h1 align="center">

Copyright Release for

Contributions To SQLite

</h1>

<p>

SQLite is software that implements an embeddable SQL database engine.

SQLite is available for free download from <http://www.sqlite.org/>.

The principal author and maintainer of SQLite has disclaimed all copyright interest in his contributions to SQLite

and thus released his contributions into the public domain.

In order to keep the SQLite software unencumbered by copyright

claims, the principal author asks others who may from time to

time contribute changes and enhancements to likewise disclaim

their own individual copyright interest.

</p>

<p>

Because the SQLite software found at <http://www.sqlite.org/> is in the

public domain, anyone is free to download the SQLite software

from that website, make changes to the software, use, distribute,

or sell the modified software, under either the original name or

under

some new name, without any need to obtain permission, pay

royalties, acknowledge the original source of the software, or

in any other way compensate, identify, or notify the original authors. Nobody is in any way compelled to contribute their SQLite changes and enhancements back to the SQLite website. This document concerns only changes and enhancements to SQLite that are intentionally and deliberately contributed back to the SQLite website.

</p>

<p>

For the purposes of this document, "SQLite software" shall mean any computer source code, documentation, makefiles, test scripts, or other information that is published on the SQLite website, <http://www.sqlite.org/>. Precompiled binaries are excluded from the definition of "SQLite software" in this document because the process of compiling the software may introduce information from outside sources which is not properly a part of SQLite.

</p>

<p>

The header comments on the SQLite source files exhort the reader to share freely and

to never take more than one gives.

In the spirit of that exhortation I make the following declarations:

</p>

<p>

I dedicate to the public domain

any and all copyright interest in the SQLite software that was publicly available on the SQLite website (<http://www.sqlite.org/>) prior to the date of the signature below and any changes or enhancements to the SQLite software

that I may cause to be published on that website in the future.

I make this dedication for the benefit of the public at large and to the detriment of my heirs and successors. I intend this dedication to be an overt act of relinquishment in perpetuity of all present and future rights to the SQLite software under copyright law.

</p>

<p>

To the best of my knowledge and belief, the changes and enhancements that I have contributed to SQLite are either originally written by me or are derived from prior works which I have verified are also in the public domain and are not subject to claims of copyright by other

parties.

</p>

<p>

To the best of my knowledge and belief, no individual, business, organization, government, or other entity has any copyright interest in the SQLite software as it existed on the SQLite website as of the date on the signature line below.

</p>

<p>

I agree never to publish any additional information to the SQLite website (by CVS, email, scp, FTP, or any other means) unless that information is an original work of authorship by me or is derived from prior published versions of SQLite.

I agree never to copy and paste code into the SQLite code base from other sources.

I agree never to publish on the SQLite website any information that would violate a law or breach a contract.

</p>

<p>

<table width="100%" cellpadding="0" cellspacing="0">

<tr>

<td width="60%" valign="top">

Signature:

<p> </p>

<p> </p>

<p> </p>

</td><td valign="top" align="left">

Date:

</td></tr>

<td colspan=2>

Name (printed):

</td>

</tr>

</table>

</body>

</html>

Found

in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-

MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/copyright-release.html

No license file was found, but licenses were detected in source scan.

<p>Public domain</p>

The source code for SQLite is in the public domain. No claim of copyright

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/different.html
No license file was found, but licenses were detected in source scan.

2006 September 14

#

The author disclaims copyright to this source code. In place of
a legal notice, here is a blessing:

#

May you do good and not evil.

May you find forgiveness for yourself and forgive others.

May you share freely, never taking more than you give.

#

This file implements regression tests for SQLite library. The

focus of this script is testing the FTS1 module.

#

\$Id: fts1c.test,v 1.11 2006/10/04 17:35:28 drh Exp \$

#

set testdir [file dirname \$argv0]

source \$testdir/tester.tcl

If SQLITE_ENABLE_FTS1 is defined, omit this file.

ifcapable !fts1 {

finish_test

return

}

Create a table of sample email data. The data comes from email

archives of Enron executives that was published as part of the

litigation against that company.

#

do_test fts1c-1.1 {

db eval {

CREATE VIRTUAL TABLE email

USING fts1([from],[to],subject,body);

BEGIN TRANSACTION;

INSERT INTO email([from],[to],subject,body) VALUES('savita.puthigai@enron.com', 'traders.eol@enron.com,
traders.eol@enron.com', 'EnronOnline- Change to Autohedge', 'Effective Monday, October 22, 2001 the following
changes will be made to the Autohedge functionality on EnronOnline.

The volume on the hedge will now respect the minimum volume and volume increment settings on the parent
product. See rules below:

? If the transaction volume on the child is less than half of the parent's minimum volume no hedge will occur.

? If the transaction volume on the child is more than half the parent's minimum volume but less than half the volume
increment on the parent, the hedge will volume will be the parent's minimum volume.

? For all other volumes, the same rounding rules will apply based on the volume increment on the parent product.

Please see example below:

Parent's Settings:

Minimum: 5000

Increment: 1000

Volume on Autohedge

transaction Volume Hedged

1 - 2499 0

2500 - 5499 5000

5500 - 6499 6000');

INSERT INTO email([from],[to],subject,body) VALUES('dana.davis@enron.com', 'laynie.east@enron.com, lisa.king@enron.com, lisa.best@enron.com,', 'Leaving Early', 'FYI:

If it's ok with everyone's needs, I would like to leave @4pm. If you think you will need my assistance past the 4 o'clock hour just let me know; I'll be more than willing to stay.');

INSERT INTO email([from],[to],subject,body) VALUES('enron_update@concuere workplace.com', 'louise.kitchen@enron.com', '<<Concur Expense Document>> - CC02.06.02', 'The following expense report is ready for approval:

Employee Name: Christopher F. Calger

Status last changed by: Mollie E. Gustafson Ms

Expense Report Name: CC02.06.02

Report Total: \$3,972.93

Amount Due Employee: \$3,972.93

To approve this expense report, click on the following link for Concur Expense.

<http://expense.ms.enron.com>');

INSERT INTO email([from],[to],subject,body)

VALUES('jeff.duff@enron.com', 'julie.johnson@enron.com', 'Work request', 'Julie,

Could you print off the current work request report by 1:30 today?

Gentlemen,

I'd like to review this today at 1:30 in our office. Also, could you provide me with your activity reports so I can have Julie enter this information.

JD');

INSERT INTO email([from],[to],subject,body) VALUES('v.weldon@enron.com', 'gary.l.carrier@usa.dupont.com, scott.joyce@bankofamerica.com', 'Enron News', 'This could turn into something big....

<http://biz.yahoo.com/rf/010129/n29305829.html>');

INSERT INTO email([from],[to],subject,body) VALUES('mark.haedicke@enron.com', 'paul.simons@enron.com', 'Re: First Polish Deal!', 'Congrats! Things seem to be building rapidly now on the Continent. Mark');

INSERT INTO email([from],[to],subject,body) VALUES('e.carter@enron.com', 't..robinson@enron.com', 'FW:

Producers Newsletter 9-24-2001', '

The producer lumber pricing sheet.

-----Original Message-----

From: Johnson, Jay

Sent: Tuesday,

October 16, 2001 3:42 PM

To: Carter, Karen E.

Subject: FW: Producers Newsletter 9-24-2001

-----Original Message-----

From: Daigre, Sergai

Sent: Friday, September 21, 2001 8:33 PM

Subject: Producers Newsletter 9-24-2001

');

INSERT INTO email([from],[to],subject,body) VALUES('david.delainey@enron.com', 'kenneth.lay@enron.com', 'Greater Houston Partnership', 'Ken, in response to the letter from Mr Miguel San Juan, my suggestion would be to offer up the Falcon for their use; however, given the tight time frame and your recent visit with Mr. Fox that it would be difficult for either you or me to participate.

I spoke to Max and he agrees with this approach.

I hope this meets with your approval.

Regards

Delainey');

INSERT INTO email([from],[to],subject,body) VALUES('lachandra.fenceroy@enron.com', 'lindy.donoho@enron.com', 'FW: Bus Applications Meeting Follow Up', 'Lindy,

Here is the original memo we discussed earlier. Please provide any information that you may have.

Your cooperation is greatly appreciated.

Thanks,

lachandra.fenceroy@enron.com

713.853.3884

877.498.3401 Pager

-----Original Message-----

From: Bisbee, Joanne

Sent: Wednesday, September 26, 2001 7:50 AM

To: Fenceroy, LaChandra

Subject: FW: Bus Applications Meeting Follow Up

Lachandra, Please get with David Duff today and see what this is about. Who are our TW accounting business users?

-----Original Message-----

From: Koh, Wendy
Sent: Tuesday, September 25, 2001 2:41 PM
To: Bisbee, Joanne
Subject: Bus Applications Meeting Follow Up

Lisa brought up a TW change effective Nov 1. It involves eliminating a turnback surcharge. I have no other information, but you might check with the business folks for any system changes required.

Wendy');

INSERT INTO email([from],[to],subject,body) VALUES('danny.mccarty@enron.com', 'fran.fagan@enron.com', 'RE: worksheets', 'Fran,

If Julie's merit needs to be lump sum, just move it over to that column. Also, send me Eric Gadd's sheets as well. Thanks.

Dan

-----Original Message-----

From: Fagan, Fran
Sent: Thursday, December 20, 2001 11:10 AM
To: McCarty, Danny
Subject: worksheets

As discussed, attached are your sheets for bonus and merit.

Thanks,

Fran Fagan
Sr. HR Rep
713.853.5219

<< File: McCartyMerit.xls >> << File: mccartyBonusCommercial_UnP.xls >>

');

INSERT INTO email([from],[to],subject,body) VALUES('bert.meyers@enron.com', 'shift.dl-portland@enron.com', 'OCTOBER SCHEDULE', 'TEAM,

PLEASE SEND ME ANY REQUESTS THAT YOU HAVE FOR OCTOBER. SO FAR I HAVE THEM FOR LEAF. I WOULD LIKE TO HAVE IT DONE BY THE 15TH OF THE MONTH. ANY QUESTIONS PLEASE GIVE ME A CALL.

BERT');

INSERT INTO email([from],[to],subject,body) VALUES('errol.mclaughlin@enron.com', 'john.arnold@enron.com, bilal.bajwa@enron.com, john.griffith@enron.com,', 'TRV Notification: (NG - PROPT P/L - 09/27/2001)', 'The

report named: NG - PROPT P/L <http://trv.corp.enron.com/linkFromExcel.asp?report_cd=11&report_name=NG+-+PROPT+P/L&category_cd=5&category_name=FINANCIAL&toc_hide=1&sTV1=5&TV1Exp=Y¤t_efct_d ate=09/27/2001>,

published as of 09/27/2001 is now available for viewing on the website.);

INSERT INTO email([from],[to],subject,body) VALUES('patrice.mims@enron.com', 'calvin.eakins@enron.com', 'Re: Small business supply assistance', 'Hi Calvin

I spoke with Rickey (boy, is he long-winded!!). Gave him the name of our credit guy, Russell Diamond.

Thank for your help!');

INSERT INTO email([from],[to],subject,body) VALUES('legal <.hall@enron.com>', 'stephanie.panus@enron.com', 'Termination update', 'City of Vernon and Salt River Project terminated their contracts. I will fax these notices to you.);

INSERT INTO email([from],[to],subject,body) VALUES('d..steffes@enron.com', 'richard.shapiro@enron.com', 'EES / ENA Government Affairs Staffing & Outside Services', 'Rick --

Here is the information on staffing and outside services. Call if you need anything else.

Jim

');

INSERT INTO email([from],[to],subject,body)

VALUES('gelliott@industrialinfo.com', 'pcopello@industrialinfo.com', 'ECAAR (Gavin), WSCC (Diablo Canyon), & NPCC (Seabrook)', 'Dear Power Outage Database Customer,

Attached you will find an excel document. The outages contained within are forced or rescheduled outages. Your daily delivery will still contain these outages.

In addition to the two excel documents, there is a dbf file that is formatted like your daily deliveries you receive nightly. This will enable you to load the data into your regular database. Any questions please let me know. Thanks.

Greg Elliott

IIR, Inc.

713-783-5147 x 3481

outages@industrialinfo.com

THE INFORMATION CONTAINED IN THIS E-MAIL IS LEGALLY PRIVILEGED AND CONFIDENTIAL INFORMATION INTENDED ONLY FOR THE USE OF THE INDIVIDUAL OR ENTITY NAMED ABOVE. YOU ARE HEREBY NOTIFIED THAT ANY DISSEMINATION, DISTRIBUTION, OR COPY OF THIS E-MAIL TO UNAUTHORIZED ENTITIES IS STRICTLY PROHIBITED. IF YOU HAVE RECEIVED THIS E-MAIL IN ERROR, PLEASE DELETE IT.

- OUTAGE.dbf

- 111201R.xls

- 111201.xls ');

INSERT INTO email([from],[to],subject,body) VALUES('enron.announcements@enron.com', 'all_ena_egm_eim@enron.com', 'EWS Brown Bag', 'MARK YOUR LUNCH CALENDARS NOW !

You are invited to attend the EWS Brown Bag Lunch Series

Featuring: RAY BOWEN, COO

Topic: Enron Industrial Markets

Thursday, March 15, 2001

11:30 am - 12:30 pm

EB 5 C2

You bring your lunch, Limited Seating

We provide drinks and dessert. RSVP x 3-9610);

INSERT INTO email([from],[to],subject,body) VALUES('chris.germany@enron.com',
'ingrid.immer@williams.com', 'Re: About St Pauls', 'Sounds good to me. I bet this is next to the Warick?? Hotel.

"Immer, Ingrid" <Ingrid.Immer@Williams.com> on 12/21/2000 11:48:47 AM

To: "'chris.germany@enron.com'" <chris.germany@enron.com>

cc:

Subject: About St Pauls

<<About St Pauls.url>>

?

?<http://www.stpaulshouston.org/about.html>

Chris,

I like the looks of this place.? What do you think about going
here Christmas

eve?? They have an 11:00 a.m. service and a candlelight service at 5:00 p.m.,
among others.

Let me know.?? ii

- About St Pauls.url

);

INSERT INTO email([from],[to],subject,body) VALUES('nas@cpuc.ca.gov', 'skatz@sempratradng.com,
kmccrea@sablau.com, thompson@wrightlaw.com', 'Reply Brief filed July 31, 2000', '- CPUC01-#76371-v1-
Revised_Reply_Brief__Due_today_7_31_.doc');

INSERT INTO email([from],[to],subject,body) VALUES('gascontrol@aglresources.com', 'dscott4@enron.com,
lcampbel@enron.com', 'Alert Posted 10:00 AM November 20,2000: E-GAS Request Reminder', 'Alert Posted 10:00
AM November 20,2000: E-GAS Request Reminder

As discussed in the Winter Operations Meeting on Sept.29,2000,

E-Gas(Emergency Gas) will not be offered this winter as a service from AGLC.

Marketers and Poolers can receive gas via Peaking and IBSS nominations(daisy chain) from other marketers up to the 6 p.m. Same Day 2 nomination cycle.

');

INSERT INTO email([from],[to],subject,body) VALUES('dutch.quigley@enron.com', 'rwolkwitz@powermerchants.com', ', ')

Here is a goody for you');

INSERT INTO email([from],[to],subject,body) VALUES('ryan.o.rourke@enron.com', 'k..allen@enron.com, randy.bhatia@enron.com, frank.ermis@enron.com,', 'TRV Notification: (West VaR - 11/07/2001)', 'The report named: West VaR

<http://trv.corp.enron.com/linkFromExcel.asp?report_cd=36&report_name=West+VaR&category_cd=2&category_name=WEST&toc_hide=1&sTV1=2&TV1Exp=Y¤t_efct_date=11/07/2001>, published as of 11/07/2001 is now available for viewing on the website.');

INSERT INTO email([from],[to],subject,body) VALUES('mjones7@txu.com', 'cstone1@txu.com, ggreen2@txu.com, timpowell@txu.com,', 'Enron / HPL Actuals for July 10, 2000', 'Teco Tap 10.000 / Enron ; 110.000 / HPL IFERC

LS HPL LSK IC 30.000 / Enron

');

INSERT INTO email([from],[to],subject,body) VALUES('susan.pereira@enron.com', 'kkw816@aol.com', 'soccer practice', 'Kathy-

Is it safe to assume that practice is cancelled for tonight??

Susan Pereira');

INSERT INTO email([from],[to],subject,body) VALUES('mark.whitt@enron.com', 'barry.tycholiz@enron.com', 'Huber Internal Memo', 'Please look at this. I didn"t know how deep to go with the desk. Do you think this works.

');

INSERT INTO email([from],[to],subject,body) VALUES('m..forney@enron.com', 'george.phillips@enron.com', ', 'George,

Give me a call and we will further discuss opportunities on the 13st floor.

Thanks,

JMForney

3-7160');

INSERT INTO email([from],[to],subject,body) VALUES('brad.mckay@enron.com', 'angusmcka@aol.com', 'Re: (no subject)', 'not yet');

INSERT INTO email([from],[to],subject,body) VALUES('adam.bayer@enron.com', 'jonathan.mckay@enron.com', 'FW: Curve Fetch File', 'Here is the curve fetch file sent to me. It has plenty of points in it. If you give me a list of which ones you need we may be able to construct a secondary worksheet to vlookup the values.

adam

35227

-----Original Message-----

From: Royed, Jeff
Sent: Tuesday,
September 25, 2001 11:37 AM
To: Bayer, Adam
Subject: Curve Fetch File

Let me know if it works. It may be required to have a certain version of Oracle for it to work properly.

Jeff Royed

Enron

Energy Operations

Phone: 713-853-5295);

INSERT INTO email([from],[to],subject,body) VALUES('matt.smith@enron.com', 'yan.wang@enron.com', 'Report Formats', 'Yan,

The merged reports look great. I believe the only orientation changes are to "unmerge" the following six reports:

31 Keystone Receipts
15 Questar Pipeline
40 Rockies Production
22 West_2
23 West_3
25 CIG_WIC

The orientation of the individual reports should be correct. Thanks.

Mat

PS. Just a reminder to add the "*" by the title of calculated points.');

INSERT INTO email([from],[to],subject,body) VALUES('michelle.lokay@enron.com', 'jimboman@bigfoot.com', 'Egyptian Festival', '----- Forwarded by Michelle Lokay/ET&S/Enron on 09/07/2000 10:08 AM -----

"Karkour, Randa" <Randa.Karkour@COMPAQ.com>

on 09/07/2000 09:01:04 AM

To: ""Agheb (E-mail)" <Agheb@aol.com>, "Leila Mankarious (E-mail)"

<Leila_Mankarious@mhhs.org>, ""Marymankarious (E-mail)"

<marymankarious@aol.com>, "Michelle lokay (E-mail)" <mlokay@enron.com>, "Ramy

Mankarious (E-mail)" <Mankarious@aol.com>

cc:

Subject: Egyptian Festival

<<Egyptian Festival.url>>

http://www.egyptianfestival.com/

- Egyptian Festival.url

);

INSERT INTO email([from],[to],subject,body) VALUES('errol.mclaughlin@enron.com',
'sherry.dawson@enron.com', 'Urgent!!! --- New EAST books', 'This has to be done.....')

Thanks

----- Forwarded by Errol McLaughlin/Corp/Enron on 12/20/2000
08:39 AM -----

From: William Kelly @ ECT 12/20/2000 08:31 AM

To: Kam Keiser/HOU/ECT@ECT, Darron C Giron/HOU/ECT@ECT, David
Baumbach/HOU/ECT@ECT, Errol McLaughlin/Corp/Enron@ENRON
cc: Kimat Singla/HOU/ECT@ECT, Kulvinder Fowler/NA/Enron@ENRON,
Kyle R
Lilly/HOU/ECT@ECT, Jeff Royed/Corp/Enron@ENRON, Alejandra
Chavez/NA/Enron@ENRON, Crystal Hyde/HOU/ECT@ECT

Subject: New EAST books

We have new book names in TAGG for our intramonth portfolios and it is extremely important that any deal booked to the East is communicated quickly to someone on my team. I know it will take some time for the new names to sink in and I do not want us to miss any positions or P&L.

Thanks for your help on this.

New:

Scott Neal : East Northeast
Dick Jenkins: East Marketeast

WK

);

INSERT INTO email([from],[to],subject,body) VALUES('david.forster@enron.com', 'eol.wide@enron.com',
'Change to Stack Manager', 'Effective immediately, there is a change to the Stack Manager which will
affect any Inactive Child.

An inactive Child with links to Parent products will not have their
calculated prices updated until the Child product is Activated.

When the Child Product is activated, the price will be recalculated and

updated BEFORE it
is displayed on the web.

This means that if you are inputting a basis price on a Child product, you will not see the final, calculated price until you Activate the product, at which time the customer will also see it.

If you have any questions, please contact the Help Desk on:

Americas: 713 853 4357
Europe: + 44 (0) 20 7783 7783
Asia/Australia: +61 2 9229 2300

Dave');

INSERT INTO email([from],[to],subject,body) VALUES('vince.kaminski@enron.com', 'jhh1@email.msn.com', 'Re: Light reading - see pieces beginning on page 7', 'John,

I saw it. Very interesting.

Vince

"John H Herbert" <jhh1@email.msn.com> on 07/28/2000 08:38:08 AM
To: "Vince J Kaminski" <Vince_J_Kaminski@enron.com>
cc:
Subject: Light reading - see pieces beginning on page 7

Cheers and have a nice weekend,

JHHerbert

- gd000728.pdf

');

INSERT INTO email([from],[to],subject,body) VALUES('matthew.lenhart@enron.com', 'mmmarcantel@equiva.com', 'RE:', 'i will try to line up a pig for you ');
INSERT INTO email([from],[to],subject,body)

VALUES('jae.black@enron.com', 'claudette.harvey@enron.com, chaun.roberts@enron.com, judy.martinez@enron.com.', 'Disaster Recovery Equipment', 'As a reminder...there are several pieces of equipment that are set up on the 30th Floor, as well as on our floor, for the Disaster Recovery Team. PLEASE DO NOT TAKE, BORROW OR USE this equipment. Should you need to use another computer system, other than yours, or make conference calls please work with your Assistant to help find or set up equipment for you to use.

Thanks for your understanding in this matter.

T.Jae Black

East Power Trading

Assistant to Kevin Presto

off. 713-853-5800

fax 713-646-8272

cell 713-539-4760');

INSERT INTO email([from],[to],subject,body) VALUES('eric.bass@enron.com', 'dale.neuner@enron.com', '5 X 24', 'Dale,

Have you heard anything more on the 5 X 24s? We would like to get this product out ASAP.

Thanks,

Eric');

INSERT INTO email([from],[to],subject,body) VALUES('messenger@smartreminders.com', 'm.tholt@enron.com', '10% Coupon - PrintPal Printer Cartridges - 100% Guaranteed', '[IMAGE]
[IMAGE][IMAGE][IMAGE]

Dear SmartReminders Member,

[IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE]

We respect your privacy and are a Certified Participant of the BBBOnLine Privacy Program. To be removed from future offers,click here.

SmartReminders.com is a permission based service. To unsubscribe click here . ');

INSERT INTO email([from],[to],subject,body) VALUES('benjamin.rogers@enron.com', 'mark.bernstein@enron.com', ', 'The guy you are talking about left CIN under a "cloud of suspicion" sort of speak. He was the one who got into several bad deals and PPA's in California for CIN, thus he left on a bad note. Let me know if you need more detail than that, I felt this was the type of info you were looking for. Thanks!

Ben');

INSERT INTO email([from],[to],subject,body)

VALUES('enron_update@concuere workplace.com', 'michelle.cash@enron.com', 'Expense Report Receipts Not Received', 'Employee Name: Michelle Cash

Report Name: Houston Cellular 8-11-01

Report Date: 12/13/01

Report ID: 594D37C9ED2111D5B452

Submitted On: 12/13/01

You are only allowed 2 reports with receipts outstanding. Your expense reports will not be paid until you meet this requirement.');

INSERT INTO email([from],[to],subject,body) VALUES('susan.mara@enron.com', 'ray.alvarez@enron.com, mark.palmer@enron.com, karen.denne@enron.com', 'CAISO Emergency Motion -- to discontinue market-based rates for', 'FYI. the latest broadside against the generators.

Sue Mara

Enron Corp.

Tel: (415) 782-7802

Fax:(415) 782-7854

----- Forwarded by Susan J Mara/NA/Enron on 06/08/2001 12:24 PM -----

"Milner, Marcie" <MMilner@coral-energy.com> 06/08/2001 11:13 AM To: ""smara@enron.com"" <smara@enron.com> cc: Subject: CAISO Emergency Motion

Sue, did you see this emergency motion the CAISO filed today? Apparently they are requesting that FERC discontinue market-based rates immediately and grant refunds plus interest on the difference between cost-based rates and market revenues received back to May 2000. They are requesting the commission act within 14 days. Have you heard anything about what they are doing?

Marcie

<http://www.caiso.com/docs/2001/06/08/200106081005526469.pdf>

');

INSERT INTO email([from],[to],subject,body) VALUES('fletcher.sturm@enron.com', 'eloy.escobar@enron.com',
'Re: General Brinks Position Meeting', 'Eloy,

Who is General Brinks?

Fletch');

INSERT INTO email([from],[to],subject,body) VALUES('nailia.dindarova@enron.com',
'richard.shapiro@enron.com', 'Documents for Mark Frevert (on EU developments and lessons from', 'Rick,

Here are the documents that Peter has prepared for Mark Frevert.

Nailia

----- Forwarded by Nailia Dindarova/LON/ECT on 25/06/2001
16:36 -----

Nailia Dindarova

25/06/2001 15:36

To:

Michael Brown/Enron@EUEnronXGate

cc: Ross Sankey/Enron@EUEnronXGate, Eric Shaw/ENRON@EUEnronXGate, Peter
Styles/LON/ECT@ECT

Subject: Documents for Mark Frevert (on EU developments and lessons from
California)

Michael,

These are the documents that Peter promised to give to you for Mark Frevert.
He has now handed them to him in person but asked me to transmit them
electronically to you, as well as Eric and Ross.

Nailia

);

INSERT INTO email([from],[to],subject,body) VALUES('peggy.a.kostial@accenture.com',
'dave.samuels@enron.com', 'EOL-Accenture Deal Sheet', 'Dave -

Attached are our comments and suggested changes. Please call to review.

On the time line for completion, we have four critical steps to complete:

Finalize market analysis to refine business case, specifically
projected revenue stream

Complete counterparty surveying, including targeting 3 CPs for letters
of intent
Review Enron asset base for potential reuse/ licensing
Contract
negotiations

Joe will come back to us with an updated time line, but it is my
expectation that we are still on the same schedule (we just begun week
three) with possibly a week or so slippage.....contract negotiations will
probably be the critical path.

We will send our cut at the actual time line here shortly. Thanks,

Peggy

(See attached file: accenture-dealpoints v2.doc)

- accenture-dealpoints v2.doc ');

INSERT INTO email([from],[to],subject,body) VALUES('thomas.martin@enron.com', 'thomas.martin@enron.com',
'Re: Guadalupe Power Partners LP', '----- Forwarded by Thomas A Martin/HOU/ECT on 03/20/2001
03:49 PM -----')

Thomas A Martin

10/11/2000 03:55 PM

To: Patrick Wade/HOU/ECT@ECT

cc:

Subject: Re: Guadalupe Power Partners LP

The deal is physically served at Oasis Waha or Oasis Katy and is priced at
either HSC, Waha or Katytailgate GD at buyers option three days prior to
NYMEX close.

');

INSERT INTO email([from],[to],subject,body)

VALUES('judy.townsend@enron.com', 'dan.junek@enron.com, chris.germany@enron.com', 'Columbia
Distribution's Capacity Available for Release - Sum', '----- Forwarded by Judy Townsend/HOU/ECT
on 03/09/2001 11:04
AM -----')

agoddard@nsource.com on 03/08/2001 09:16:57 AM

To: " - *Koch, Kent" <kkoch@nsource.com>, " -

*Millar, Debra" <dmillar@nsource.com>, " - *Burke, Lynn"
<lburke@nsource.com>

cc: " - *Heckathorn, Tom" <heckathorn@nsource.com>

Subject: Columbia Distribution's Capacity Available for Release - Sum

Attached is Columbia Distribution's notice of capacity available for release for the summer of 2001 (Apr. 2001 through Oct. 2001).

Please note that the deadline for bids is 3:00pm EST on March 20, 2001.

If you have any questions, feel free to contact any of the representatives listed at the bottom of the attachment.

Aaron Goddard

- 2001Summer.doc

');

INSERT INTO

email([from],[to],subject,body) VALUES('rhonda.denton@enron.com', 'tim.belden@enron.com, dana.davis@enron.com, genia.fitzgerald@enron.com,', 'Split Rock Energy LLC', 'We have received the executed EEI contract from this CP dated 12/12/2000.

Copies will be distributed to Legal and Credit.');

INSERT INTO email([from],[to],subject,body) VALUES('kerrymcelroy@dwt.com', 'jack.speer@alcoa.com, crow@millernash.com, michaelearly@earthlink.net,', 'Oral Argument Request', ' - Oral Argument Request.doc');

INSERT INTO email([from],[to],subject,body) VALUES('mike.carson@enron.com', 'rlmichaelis@hormel.com', ', 'Did you come in town this wk end..... My new number at our house is : 713-668-3712..... my cell # is 281-381-7332

the kid');

INSERT INTO email([from],[to],subject,body) VALUES('cooper.richey@enron.com', 'trycooper@hotmail.com', 'FW: Contact Info', '

-----Original Message-----

From: Punja, Karim

Sent: Thursday, December 13, 2001 2:35 PM

To: Richey, Cooper

Subject: Contact Info

Cooper,

Its

been a real pleasure working with you (even though it was for only a small amount of time)

I hope we can stay in touch.

Home# 234-0249

email: kpunja@hotmail.com

Take Care,

Karim.

');

INSERT INTO email([from],[to],subject,body) VALUES('bjm30@earthlink.net', 'mcguinn.k@enron.com, mcguinn.ian@enron.com, mcguinn.stephen@enron.com,', 'email address change', 'Hello all.

I haven't talked to many of you via email recently but I do want to give you my new address for your email file:

bjm30@earthlink.net

I hope all is well.

Brian McGuinn');

INSERT INTO email([from],[to],subject,body) VALUES('shelley.corman@enron.com', 'steve.hotte@enron.com', 'Flat Panels', 'Can you please advise what is going on with the flat panels that we had planned to distribute to our gas logistics team. It was in the budget and we had the okay, but now I'm hearing there is some hold-up & the units are stored on 44.

Shelley');

INSERT INTO email([from],[to],subject,body) VALUES('sara.davidson@enron.com', 'john.schwartzenburg@enron.com, scott.dieball@enron.com, recipients@enron.com,', '2001 Enron Law Conference (Distribution List 2)', ' Enron Law Conference

San Antonio, Texas May 2-4, 2001 Westin Riverwalk

See attached memo for more details!!

? Registration for the law conference this year will be handled through an Online RSVP Form on the Enron Law Conference Website at <http://lawconference.corp.enron.com>. The website is still under construction and will not be available until Thursday, March 15, 2001.

? We will send you another e-mail to confirm when the Law Conference Website is operational.

? Please complete the Online RSVP Form as soon as it is available and submit it no later than Friday, March 30th.

');

INSERT INTO email([from],[to],subject,body) VALUES('tori.kuykendall@enron.com', 'heath.b.taylor@accenture.com', 'Re:', 'hey - thats funny about john - he definitely remembers him - i'll call pat and let him know - we are coming

on saturday - i just havent had a chance to
call you guys back -- looking forward to it -- i probably need the
directions again though');
INSERT INTO email([from],[to],subject,body) VALUES('darron.giron@enron.com', 'bryce.baxter@enron.com',
'Re: Feedback for Audrey Cook', 'Bryce,

I'll get it done today.

DG 3-9573

From: Bryce Baxter 06/12/2000 07:15 PM

To: Darron C Giron/HOU/ECT@ECT
cc:
Subject: Feedback for Audrey Cook

You were identified as a reviewer for Audrey Cook. If possible, could you
complete her feedback by end of business Wednesday? It will really help me
in the PRC process to have your input. Thanks.

);
INSERT INTO email([from],[to],subject,body) VALUES('casey.evans@enron.com', 'stephanie.sever@enron.com',
'Gas EOL ID', 'Stephanie,

In conjunction with the recent movement of several power traders, they are changing the names of their gas books as
well. The names of the new gas books and traders are as follows:

PWR-NG-LT-SPP:
Mike Carson
PWR-NG-LT-SERC: Jeff King

If you need to know their power desk to map their ID to their gas books, those desks are as follows:

EPMI-LT-SPP: Mike Carson
EPMI-LT-SERC: Jeff King

I will be in training this afternoon, but will be back when class is over. Let me know if you have any questions.

Thanks for your help!
Casey');
INSERT INTO email([from],[to],subject,body) VALUES('darrell.schoolcraft@enron.com',
'david.roensch@enron.com, kimberly.watson@enron.com, michelle.lokay@enron.com,', 'Postings', 'Please see the
attached.

ds

');

INSERT INTO email([from],[to],subject,body) VALUES('mcominsky@aol.com', 'cpatman@bracepatt.com, james_derrick@enron.com', 'Jurisprudence Luncheon', 'Carrin & Jim --

It was an honor and a pleasure to meet both of you yesterday. I know we will have fun working together on this very special event.

Jeff left the jurisprudence luncheon lists for me before he left on vacation.

I wasn't sure whether he transmitted them

to you as well. Would you please

advise me if you would like them sent to you? I can email the MS Excel files or I can fax the hard copies to you. Please advise what is most convenient.

I plan to be in town through the holidays and can be reached by phone, email, or cell phone at any time. My cell phone number is 713/705-4829.

Thanks again for your interest in the ADL's work. Martin.

Martin B. Cominsky

Director, Southwest Region

Anti-Defamation League

713/627-3490, ext. 122

713/627-2011 (fax)

MCominsky@aol.com');

INSERT INTO email([from],[to],subject,body) VALUES('phillip.love@enron.com', 'todagost@utmb.edu, gbsonnta@utmb.edu', 'New President', 'I had a little bird put a word in my ear. Is there any possibility for Ben Raimer to be Bush's secretary of HHS? Just curious about that infamous UTMB rumor mill. Hope things are well, happy holidays.

PL');

INSERT INTO email([from],[to],subject,body) VALUES('marie.heard@enron.com', 'ehamilton@fna.com', 'ISDA Master Agreement',

'Erin:

Pursuant to your request, attached are the Schedule to the ISDA Master Agreement, together with Paragraph 13 to the ISDA Credit Support Annex. Please let me know if you need anything else. We look forward to hearing your comments.

Marie

Marie Heard

Senior Legal Specialist

Enron North America Corp.
Phone: (713) 853-3907
Fax: (713) 646-3490
marie.heard@enron.com

);
INSERT INTO email([from],[to],subject,body) VALUES('andrea.ring@enron.com', 'beverly.beaty@enron.com',
'Re: Tennessee Buy - Louis Dreyfus', 'Beverly - once again thanks so much for your help on this.

);
INSERT INTO email([from],[to],subject,body) VALUES('karolyn.criado@enron.com', 'j..bonin@enron.com,
felicia.case@enron.com, b..clapp@enron.com,', 'Price List week of Oct. 8-9, 2001', '
Please contact me if you have any questions regarding last weeks prices.

Thank you,
Karolyn Criado
3-9441

);
INSERT INTO email([from],[to],subject,body)
VALUES('kevin.presto@enron.com', 'edward.baughman@enron.com, billy.braddock@enron.com', 'Associated',
'Please begin working on filling our Associated short position in 02. I would like to take this risk off the books.

In addition, please find out what a buy-out of VEPCO would cost us. With Rogers transitioning to run our retail
risk management, I would like to clean up our customer positions.

We also need to continue to explore a JEA buy-out.

Thanks.);
INSERT INTO email([from],[to],subject,body) VALUES('stacy.dickson@enron.com', 'gregg.penman@enron.com',
'RE: Constellation TC 5-7-01', 'Gregg,

I am at home with a sick baby. (Lots of fun!) I will call you about this
tomorrow.

Stacy');
INSERT INTO email([from],[to],subject,body) VALUES('joe.quenet@enron.com', 'dfincher@utilicorp.com', ", 'hey
big guy.....check this out.....

w ww.gorelieberman-2000.com/");
INSERT INTO email([from],[to],subject,body) VALUES('k..allen@enron.com', 'jacqestc@aol.com', ",
'Jacques,

I sent you a fax of Kevin Kolb's comments on the release. The payoff on the note would be \$36,248 (\$36090(principal) + \$158 (accrued interest)).

This is assuming we wrap this up on Tuesday.

Please email to confirm that their changes are ok so I can set up a meeting on Tuesday to reach closure.

Phillip');

INSERT INTO email([from],[to],subject,body) VALUES('kourtney.nelson@enron.com', 'mike.swerzbin@enron.com', 'Adjusted L/R Balance', 'Mike,

I placed the adjusted L/R Balance on the Enronwest site. It is under the "Staff/Kourtney Nelson". There are two links:

- 1) "Adj L_R" is the same data/format from the weekly strategy meeting.
- 2) "New Gen 2001_2002" link has all of the supply side info that is used to calculate the L/R balance -Please note the Data Flag column, a value of "3" indicates the project was cancelled, on hold, etc and is not included in the calc.

Both of these sheets are interactive Excel spreadsheets and thus you can play around with the data as you please. Also, James Bruce is working to get his gen report on the web. That will help with your access to information on new gen.

Please let me know if you have any questions or feedback,

Kourtney

Kourtney Nelson

Fundamental Analysis

Enron North America

(503) 464-8280

kourtney.nelson@enron.com');

INSERT INTO email([from],[to],subject,body) VALUES('d..thomas@enron.com', 'naveed.ahmed@enron.com', 'FW: Current Enron TCC Portfolio', '

-----Original Message-----

From: Grace, Rebecca M.

Sent: Monday, December 17, 2001 9:44 AM

To: Thomas, Paul D.

Cc: Cashion, Jim; Allen, Thresa A.; May, Tom

Subject: RE: Current Enron TCC Portfolio

Paul,

I reviewed NY's list. I agree with all of their contracts numbers and mw amounts.

Call if you have any more questions.

Rebecca

-----Original Message-----

From: Thomas, Paul D.
Sent: Monday, December 17, 2001 9:08 AM
To: Grace, Rebecca M.
Subject: FW: Current Enron TCC Portfolio

<< File: enrontccs.xls >>

Rebecca,
Let me know if you
see any differences.

Paul

X 3-0403

-----Original Message-----

From: Thomas, Paul D.
Sent: Monday, December 17, 2001 9:04 AM
To: Ahmed, Naveed
Subject: FW: Current Enron TCC Portfolio

-----Original Message-----

From: Thomas, Paul D.
Sent: Thursday, December 13, 2001 10:01 AM
To: Baughman, Edward D.
Subject: Current Enron TCC Portfolio

');

INSERT INTO email([from],[to],subject,body) VALUES('stephanie.panus@enron.com',
'william.bradford@enron.com, debbie.brackett@enron.com,', 'Coastal Merchant Energy/El Paso Merchant Energy',
'Coastal Merchant Energy, L.P. merged with and into El Paso Merchant Energy,
L.P., effective February 1, 2001, with the surviving entity being El Paso
Merchant Energy, L.P. We currently have ISDA Master Agreements with both
counterparties. Please see the attached memo regarding the existing Masters
and let us know which agreement should be terminated.

Thanks,
Stephanie

');

INSERT INTO email([from],[to],subject,body) VALUES('kam.keiser@enron.com', 'c..kenne@enron.com',

'RE: What about this too???' , '

-----Original Message-----

From: Kenne, Dawn C.
Sent: Wednesday, February 06, 2002 11:50 AM
To: Keiser, Kam
Subject: What about this too???

<< File: Netco Trader Matrix.xls >>

');

INSERT INTO email([from],[to],subject,body) VALUES('chris.meyer@enron.com', 'joe.parks@enron.com', 'Centana', 'Talked to Chip. We do need Cash Committe approval given the netting feature of your deal, which means Batch Funding Request. Please update per my previous e-mail and forward.

Thanks

chris

x31666');

INSERT INTO email([from],[to],subject,body) VALUES('debra.perlingiere@enron.com', 'jworman@academyofhealth.com', ', 'Have a great weekend! Happy Fathers Day!

Debra Perlingiere

Enron North America Corp.

1400 Smith Street, EB 3885

Houston, Texas 77002

dperlin@enron.com

Phone 713-853-7658

Fax 713-646-3490');

INSERT INTO email([from],[to],subject,body) VALUES('outlook.team@enron.com', ', 'Demo by Martha Janousek of Dashboard & Pipeline

Profile / Julia &', 'CALENDAR ENTRY: APPOINTMENT

Description:

Demo by Martha Janousek of Dashboard & Pipeline Profile / Julia & Dir Rpts. - 4102

Date: 1/5/2001

Time: 9:00 AM - 10:00 AM (Central Standard Time)

Chairperson: Outlook Migration Team

Detailed Description:');

INSERT INTO email([from],[to],subject,body) VALUES('diana.seifert@enron.com', 'mark.taylor@enron.com', 'Guest access Chile', 'Hello Mark,

Justin Boyd told me that your can help me with questions regarding Chile.

We got a request for guest access through MG.

The company is called Escondida and is a subsidiary of BHP Australia.

Please advise if I can set up a guest account or not.

F.Y.I.: MG is planning to put a "in w/h Chile" contract for Copper on-line as soon as Enron has done the due diligence for this country.

Thanks !

Best regards

Diana Seifert

EOL PCG');

INSERT INTO email([from],[to],subject,body) VALUES('enron_update@concuere workplace.com', 'mark.whitt@enron.com', '<<Concur Expense Document>> - 121001',

'The Approval status has changed on the following report:

Status last changed by: Barry L. Tycholiz

Expense Report Name: 121001

Report Total: \$198.98

Amount Due Employee: \$198.98

Amount Approved: \$198.98

Amount Paid: \$0.00

Approval Status: Approved

Payment Status: Pending

To review this expense report, click on the following link for Concur Expense.

<http://expense.ms.enron.com>');

INSERT INTO email([from],[to],subject,body) VALUES('kevin.hyatt@enron.com', ', 'Technical Support', 'Outside the U.S., please refer to the list below:

Australia:

1800 678-515

support@palm-au.com

Canada:

1905 305-6530

support@palm.com

New Zealand:

0800 446-398

support@palm-nz.com

U.K.:

0171 867 0108

eurosupport@palm.3com.com

Please refer to the Worldwide Customer Support card for a complete technical support contact list.');

INSERT INTO email([from],[to],subject,body) VALUES('geoff.storey@enron.com', 'dutch.quigley@enron.com', 'RE:', 'duke contact?')

-----Original Message-----

From: Quigley, Dutch

Sent: Wednesday, October 31, 2001 10:14 AM

To: Storey, Geoff

Subject: RE:

bp corp Albert LaMore 281-366-4962

running the reports now

-----Original Message-----

From: Storey, Geoff

Sent: Wednesday, October 31, 2001 10:10 AM

To: Quigley, Dutch

Subject: RE:

give me a contact over there too

BP

-----Original Message-----

From: Quigley, Dutch

Sent: Wednesday, October 31, 2001 9:42 AM

To: Storey, Geoff

Subject:

Coral Jeff Whitnah 713-767-5374

Relaint Steve McGinn 713-207-4000);

INSERT INTO email([from],[to],subject,body) VALUES('pete.davis@enron.com', 'pete.davis@enron.com', 'Start Date: 4/22/01; HourAhead hour: 3; <CODESITE>', 'Start Date: 4/22/01; HourAhead hour: 3; No ancillary schedules awarded.

Variances detected.

Variances detected in Load schedule.

LOG MESSAGES:

PARSING FILE -->> O:\Portland\WestDesk\California Scheduling\ISO Final Schedules\2001042203.txt

---- Load Schedule ----

\$\$\$ Variance found in table tblLoads.

Details: (Hour: 3 / Preferred:

1.92 / Final: 1.89)
TRANS_TYPE: FINAL
LOAD_ID: PGE4
MKT_TYPE: 2
TRANS_DATE: 4/22/01
SC_ID: EPMI

```
);  
INSERT INTO email([from],[to],subject,body) VALUES('john.postlethwaite@enron.com',  
'john.zufferli@enron.com', 'Reference', 'John, hope things are going well up there for you. The big day is almost  
here for you and Jessica. I was wondering if I could use your name as a job reference if need be. I am just trying to  
get everything in order just in case something happens.
```

```
John');  
INSERT INTO email([from],[to],subject,body) VALUES('jeffrey.shankman@enron.com',  
'lschiffm@jonesday.com', 'Re:', 'I saw you called on the cell this a.m. Sorry I missed you. (I was in the  
shower). I have had a shitty week--I suspect my silence (not only to you,  
but others) after our phone call is a result of the week. I'm seeing Glen at  
11:15....talk to you');  
INSERT INTO email([from],[to],subject,body) VALUES('litebytz@enron.com', ', 'Lite Bytz RSVP', '  
This week's Lite Bytz presentation  
will feature the following TOOLZ speaker:
```

Richard McDougall
Solaris 8
Thursday, June 7, 2001

If you have not already signed up, please RSVP via email to litebytz@enron.com by the end of the day Tuesday, June 5, 2001.

*Remember: this is now a Brown Bag Event--so bring your lunch and we will provide cookies and drinks.

Click below for more details.

<http://home.enron.com:84/messaging/litebytztoolzprint.jpg>);

```
COMMIT;  
}  
} {}
```

```
#####  
# Everything above just builds an interesting test database. The actual  
# tests come after this comment.  
#####
```

```
do_test fts1c-1.2 {  
  execsql {  
    SELECT rowid FROM email WHERE email MATCH 'mark'  
  }  
}
```

```

} {6 17 25 38 40 42 73 74}
do_test fts1c-1.3 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'susan'
  }
} {24 40}
do_test fts1c-1.4 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark
susan'
  }
} {40}
do_test fts1c-1.5 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'susan mark'
  }
} {40}
do_test fts1c-1.6 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH "'mark susan'"
  }
} {}
do_test fts1c-1.7 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark -susan'
  }
} {6 17 25 38 42 73 74}
do_test fts1c-1.8 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH '-mark susan'
  }
} {24}
do_test fts1c-1.9 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark OR susan'
  }
} {6 17 24 25 38 40 42 73 74}

# Some simple tests of the automatic "offsets(email)" column. In the sample
# data set above, only one message, number 20, contains the words
# "gas" and "reminder" in both body and subject.
#
do_test fts1c-2.1 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE email MATCH 'gas reminder'
  }
} {20 {2 0 42 3 2 1 54 8 3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}

```

```

do_test fts1c-2.2 {
  execsql {

    SELECT rowid, offsets(email) FROM email
      WHERE email MATCH 'subject:gas reminder'
  }
} {20 {2 0 42 3 2 1 54 8 3 1 54 8}}
do_test fts1c-2.3 {
  execsql {
    SELECT rowid, offsets(email) FROM email
      WHERE email MATCH 'body:gas reminder'
  }
} {20 {2 1 54 8 3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}
do_test fts1c-2.4 {
  execsql {
    SELECT rowid, offsets(email) FROM email
      WHERE subject MATCH 'gas reminder'
  }
} {20 {2 0 42 3 2 1 54 8}}
do_test fts1c-2.5 {
  execsql {
    SELECT rowid, offsets(email) FROM email
      WHERE body MATCH 'gas reminder'
  }
} {20 {3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}

# Document 32 contains 5 instances of the world "child". But only
# 3 of them are paired with "product". Make sure only those instances
# that match the phrase appear in the offsets(email) list.
#
do_test fts1c-3.1 {
  execsql {
    SELECT rowid, offsets(email) FROM email
      WHERE body MATCH 'child product' AND +rowid=32
  }
} {32 {3 0 94 5 3 0 114 5 3 0 207
5 3 1 213 7 3 0 245 5 3 1 251 7 3 0 409 5 3 1 415 7 3 1 493 7}}
do_test fts1c-3.2 {
  execsql {
    SELECT rowid, offsets(email) FROM email
      WHERE body MATCH "'child product'"
  }
} {32 {3 0 207 5 3 1 213 7 3 0 245 5 3 1 251 7 3 0 409 5 3 1 415 7}}

# Snippet generator tests
#
do_test fts1c-4.1 {
  execsql {

```



```

SELECT snippet(email) FROM email
WHERE email MATCH 'subject:gas reminder'
}
} {{Alert Posted 10:00 AM November 20,2000: E-<b>GAS</b> Request <b>Reminder</b>}}
do_test fts1c-4.2 {
execsql {
SELECT snippet(email) FROM email
WHERE email MATCH 'christmas candlelight'
}
} {{<b>...</b> place.? What do you think about going here <b>Christmas</b>
eve?? They have an 11:00 a.m. service and a <b>candlelight</b> service at 5:00 p.m.,
among others. <b>...</b>}}

do_test fts1c-4.3 {
execsql {
SELECT snippet(email) FROM email
WHERE email MATCH 'deal sheet potential reuse'
}
} {{EOL-Accenture <b>Deal</b> <b>Sheet</b> <b>...</b> intent
Review Enron
asset base for <b>potential</b> <b>reuse</b>/ licensing
Contract negotiations <b>...</b>}}
do_test fts1c-4.4 {
execsql {
SELECT snippet(email,'<<<','>>>',') FROM email
WHERE email MATCH 'deal sheet potential reuse'
}
} {{EOL-Accenture <<<Deal>>> <<<Sheet>>> intent
Review Enron asset base for <<<potential>>> <<<reuse>>>/ licensing
Contract negotiations }}
do_test fts1c-4.5 {
execsql {
SELECT snippet(email,'<<<','>>>',') FROM email
WHERE email MATCH 'first things'
}
} {{Re: <<<First>>> Polish Deal! Congrats! <<<Things>>> seem to be building rapidly now on the }}
do_test fts1c-4.6 {
execsql {
SELECT snippet(email) FROM email
WHERE email MATCH 'chris is here'
}
} {{<b>chris</b>.germany@enron.com <b>...</b> Sounds good to me. I bet this <b>is</b> next to the Warick??
Hotel. <b>...</b> place.? What do you think about going <b>here</b> Christmas
eve?? They have an 11:00 a.m. <b>...</b>}}
do_test fts1c-4.7 {
execsql {
SELECT

```

```
snippet(email) FROM email
  WHERE email MATCH "'pursuant to'"
}
} {{Erin:
```

Pursuant to your request, attached are the Schedule to ...}}

```
do_test fts1c-4.8 {
```

```
  execsql {
```

```
    SELECT snippet(email) FROM email
```

```
    WHERE email MATCH 'ancillary load davis'
```

```
  }
```

```
} {{pete.<b>davis</b>@enron.com <b>...</b> Start Date: 4/22/01; HourAhead hour: 3; No <b>ancillary</b>
schedules awarded.
```

Variances detected.

Variances detected in Load schedule.

LOG MESSAGES:

```
PARSING <b>...</b>}}
```

Combinations of AND and OR operators:

```
#
```

```
do_test fts1c-5.1 {
```

```
  execsql {
```

```
    SELECT snippet(email) FROM email
```

```
    WHERE email MATCH 'questar enron OR com'
```

```
  }
```

```
} {{matt.smith@<b>enron</b>.<b>com</b> <b>...</b> six reports:
```

31 Keystone Receipts

15 Questar Pipeline

40 Rockies Production

22 West_2 ...}}

```
do_test fts1c-5.2 {
```

```
  execsql {
```

```
    SELECT snippet(email) FROM email
```

```
    WHERE email MATCH 'enron OR com questar'
```

```
  }
```

```
} {{matt.smith@<b>enron</b>.<b>com</b> <b>...</b>
```

six reports:

31 Keystone Receipts

15 Questar Pipeline

40 Rockies Production

22 West_2 ...}}

```
finish_test
```

Found in path(s):

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/test/fts1c.test

No license file was found, but licenses were detected in source scan.

%define name sqlite

%define version SQLITE_VERSION

%define release 1

Name: % { name }

Summary: SQLite is a C library that implements an embeddable SQL database engine

Version: % { version }

Release: % { release }

Source: % { name }-% { version }.tar.gz

Group: System/Libraries

URL: <http://www.sqlite.org/>

License: Public Domain

BuildRoot: % { _tmppath }/% { name }-% { version }-root

%description

SQLite is a software library that implements a self-contained, serverless, zero-configuration, transactional SQL database engine.

Programs that link with the SQLite library can have SQL database access without running a separate RDBMS process. The distribution comes with a standalone command-line access program (sqlite) that can be used to administer an SQLite database and which serves as an example of how to use the SQLite library.

%package -n % { name }-devel

Summary: Header files and libraries for developing apps which will use sqlite

Group: Development/C

Requires:

% { name } = % { version }-% { release }

%description -n % { name }-devel

The sqlite-devel package contains the header files and libraries needed to develop programs that use the SQLite database library.

%prep

%setup -q -n % { name }

%build

CFLAGS="%optflags -DNDEBUG=1" CXXFLAGS="%optflags -DNDEBUG=1" ./configure --prefix=% { _prefix }

make

make doc

%install

```
install -d $RPM_BUILD_ROOT/%{_prefix}
install -d $RPM_BUILD_ROOT/%{_prefix}/bin
install -d $RPM_BUILD_ROOT/%{_prefix}/include
install -d $RPM_BUILD_ROOT/%{_prefix}/lib
make install prefix=$RPM_BUILD_ROOT/%{_prefix}
```

```
%post -p /sbin/ldconfig
```

```
%postun -p /sbin/ldconfig
```

```
%clean
```

```
rm -fr $RPM_BUILD_ROOT
```

```
%files
```

```
%defattr(-, root, root)
```

```
%{_libdir}/*.so*
```

```
%{_bindir}/*
```

```
%files -n %{name}-devel
```

```
%defattr(-, root, root)
```

```
%{_libdir}/pkgconfig/sqlite3.pc
```

```
%{_libdir}/*.a
```

```
%{_libdir}/*.la
```

```
%{_includedir}/*
```

```
%doc doc/*
```

```
Found in path(s):
```

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/spec.template
```

```
No license file was found, but licenses were detected in source scan.
```

```
# 2006 September 14
```

```
#
```

```
# The author disclaims copyright to this source code. In place of
```

```
# a legal notice, here is a blessing:
```

```
#
```

```
# May you do good and not evil.
```

```
# May you find forgiveness for yourself and forgive others.
```

```
# May you share freely, never taking more than you give.
```

```
#
```

```
*****
```

```
# This file implements regression tests for SQLite library. The
```

```
# focus of this script is testing the FTS3 module.
```

```
#
```

```
# $Id: fts3ac.test,v 1.1 2007/08/20 17:38:42 shess Exp $
```

```
#
```

```
set testdir [file dirname $argv0]
```

```
source $testdir/tester.tcl
```

```
# If SQLITE_ENABLE_FTS3 is defined, omit this file.
```

```
ifcapable !fts3 {  
  finish_test  
  return  
}
```

```
# Create a table of sample email data. The data comes from email
```

```
# archives of Enron executives that was published as part of the
```

```
# litigation against that company.
```

```
#
```

```
do_test fts3ac-1.1 {
```

```
  db eval {
```

```
    CREATE VIRTUAL TABLE email
```

```
    USING fts3([from],[to],subject,body);
```

```
    BEGIN TRANSACTION;
```

```
    INSERT INTO email([from],[to],subject,body) VALUES('savita.puthigai@enron.com', 'traders.eol@enron.com,  
traders.eol@enron.com', 'EnronOnline- Change to Autohedge', 'Effective Monday, October 22, 2001 the following  
changes will be made to the Autohedge functionality on EnronOnline.
```

The volume on the hedge will now respect the minimum volume and volume increment settings on the parent product. See rules below:

? If the transaction volume on the child is less than half of the parent's minimum volume no hedge will occur.

? If the transaction volume on the child is more than half the parent's minimum volume but less than half the volume increment on the parent, the hedge will volume will be the parent's minimum volume.

? For all other volumes, the same rounding rules will apply based on the volume increment on the parent product.

Please see example below:

Parent's Settings:

Minimum: 5000

Increment: 1000

Volume on Autohedge

transaction	Volume Hedged
-------------	---------------

1 - 2499	0
----------	---

2500 - 5499	5000
-------------	------

5500 - 6499	6000
-------------	------

```
INSERT INTO email([from],[to],subject,body) VALUES('dana.davis@enron.com', 'laynie.east@enron.com,  
lisa.king@enron.com, lisa.best@enron.com,', 'Leaving Early', 'FYI:
```

```
If it's ok with everyone's needs, I would like to leave @4pm. If you think  
you will need my assistance past the 4 o'clock hour just let me know; I'll  
be more than willing to stay.);
```

```
INSERT INTO email([from],[to],subject,body) VALUES('enron_update@concuworkplace.com',
```

```
'louise.kitchen@enron.com', '<<Concur Expense Document>> - CC02.06.02', 'The following expense report is ready  
for approval:
```

Employee Name: Christopher F. Calger
Status last changed by: Mollie E. Gustafson Ms
Expense Report Name: CC02.06.02
Report Total: \$3,972.93
Amount Due Employee: \$3,972.93

To approve this expense report, click on the following link for Concur Expense.

<http://expensecms.enron.com>);

INSERT INTO email([from],[to],subject,body)

VALUES('jeff.duff@enron.com', 'julie.johnson@enron.com', 'Work request', 'Julie,

Could you print off the current work request report by 1:30 today?

Gentlemen,

I'd like to review this today at 1:30 in our office. Also, could you provide me with your activity reports so I can have Julie enter this information.

JD');

INSERT INTO email([from],[to],subject,body) VALUES('v.weldon@enron.com', 'gary.l.carrier@usa.dupont.com, scott.joyce@bankofamerica.com', 'Enron News', 'This could turn into something big....

<http://biz.yahoo.com/rf/010129/n29305829.html>);

INSERT INTO email([from],[to],subject,body) VALUES('mark.haedicke@enron.com', 'paul.simons@enron.com', 'Re: First Polish Deal!', 'Congrats! Things seem to be building rapidly now on the Continent. Mark');

INSERT INTO email([from],[to],subject,body) VALUES('e..carter@enron.com', 't..robinson@enron.com', 'FW: Producers Newsletter 9-24-2001', '

The producer lumber pricing sheet.

-----Original Message-----

From: Johnson, Jay

Sent: Tuesday, October 16, 2001 3:42 PM

To: Carter, Karen E.

Subject: FW: Producers Newsletter 9-24-2001

-----Original Message-----

From: Daigre, Sergai

Sent: Friday, September 21, 2001 8:33 PM

Subject: Producers Newsletter 9-24-2001

);

INSERT INTO email([from],[to],subject,body) VALUES('david.delainey@enron.com', 'kenneth.lay@enron.com', 'Greater Houston Partnership', 'Ken, in response to the letter from Mr Miguel San Juan, my suggestion would

be to offer up the Falcon for their use; however, given the tight time frame

and your recent visit with Mr. Fox that it would be difficult for either you

or me to participate.

I spoke to Max and he agrees with this approach.

I hope this meets with your approval.

Regards

Delainey');

INSERT INTO email([from],[to],subject,body) VALUES('lachandra.fenceroy@enron.com',
'lindy.donoho@enron.com', 'FW: Bus Applications Meeting Follow Up', 'Lindy,

Here is the original memo we discussed earlier. Please provide any information that you may have.

Your cooperation is greatly appreciated.

Thanks,

lachandra.fenceroy@enron.com

713.853.3884

877.498.3401 Pager

-----Original Message-----

From: Bisbee, Joanne

Sent: Wednesday, September 26, 2001 7:50 AM

To: Fenceroy, LaChandra

Subject: FW: Bus Applications Meeting Follow Up

Lachandra, Please get with David Duff today and see what this is about. Who are our TW accounting business users?

-----Original Message-----

From: Koh, Wendy

Sent: Tuesday, September 25, 2001 2:41 PM

To: Bisbee, Joanne

Subject: Bus Applications Meeting Follow Up

Lisa brought up a TW change effective Nov 1. It involves eliminating a turnback surcharge. I have no other information, but you might check with the business folks for any system changes required.

Wendy');

INSERT INTO email([from],[to],subject,body) VALUES('danny.mccarty@enron.com', 'fran.fagan@enron.com',
'RE: worksheets', 'Fran,

If Julie's merit needs to be lump sum, just move it over to that column. Also, send me Eric Gadd's sheets as well. Thanks.

Dan

-----Original Message-----

From: Fagan, Fran
Sent: Thursday, December 20, 2001 11:10 AM
To: McCarty, Danny
Subject: worksheets

As discussed, attached are your sheets for bonus and merit.

Thanks,

Fran Fagan
Sr. HR Rep
713.853.5219

<< File: McCartyMerit.xls >> << File: mccartyBonusCommercial_UnP.xls >>

);
INSERT INTO email([from],[to],subject,body) VALUES('bert.meyers@enron.com', 'shift.dl-portland@enron.com',
'OCTOBER SCHEDULE', 'TEAM,

PLEASE SEND ME ANY REQUESTS THAT YOU HAVE FOR OCTOBER. SO FAR I HAVE THEM FOR
LEAF. I WOULD LIKE TO HAVE IT DONE BY THE 15TH OF THE MONTH. ANY QUESTIONS PLEASE
GIVE ME A CALL.

BERT');
INSERT INTO email([from],[to],subject,body) VALUES('errol.mclaughlin@enron.com', 'john.arnold@enron.com,
bilal.bajwa@enron.com, john.griffith@enron.com,', 'TRV Notification: (NG - PROPT P/L - 09/27/2001)', 'The
report named: NG - PROPT P/L <http://trv.corp.enron.com/linkFromExcel.asp?report_cd=11&report_name=NG+-+PROPT+P/L&category_cd=5&category_name=FINANCIAL&toc_hide=1&sTV1=5&TV1Exp=Y¤t_efct_date=09/27/2001>,
published as of 09/27/2001 is now available for viewing on the website.');

INSERT INTO email([from],[to],subject,body) VALUES('patrice.mims@enron.com', 'calvin.eakins@enron.com',
'Re: Small business supply assistance', 'Hi Calvin

I spoke with Rickey (boy, is he long-winded!!). Gave him the name of our
credit guy, Russell Diamond.

Thank for your help!);
INSERT INTO email([from],[to],subject,body) VALUES('legal <.hall@enron.com>', 'stephanie.panus@enron.com',
'Termination update', 'City of Vernon and Salt River Project terminated their contracts. I will fax these notices to
you.');

INSERT INTO email([from],[to],subject,body) VALUES('d..steffes@enron.com', 'richard.shapiro@enron.com',
'EES / ENA Government Affairs Staffing & Outside Services', 'Rick --

Here is the information on staffing and outside services. Call if you need anything else.

Jim

);
INSERT INTO email([from],[to],subject,body)
VALUES('gelliott@industrialinfo.com', 'pcopello@industrialinfo.com', 'ECAAR (Gavin), WSCC (Diablo Canyon),
& NPCC (Seabrook)', 'Dear Power Outage Database Customer,
Attached you will find an excel document. The outages contained within are forced or rescheduled outages. Your
daily delivery will still contain these outages.
In addition to the two excel documents, there is a dbf file that is formatted like your daily deliveries you receive
nightly. This will enable you to load the data into your regular database. Any questions please let me know. Thanks.
Greg Elliott
IIR, Inc.
713-783-5147 x 3481
outages@industrialinfo.com

THE INFORMATION CONTAINED IN THIS E-MAIL IS LEGALLY PRIVILEGED AND CONFIDENTIAL
INFORMATION INTENDED ONLY FOR THE USE OF THE INDIVIDUAL OR ENTITY NAMED ABOVE.
YOU ARE HEREBY NOTIFIED THAT ANY DISSEMINATION, DISTRIBUTION, OR COPY OF THIS E-
MAIL TO UNAUTHORIZED ENTITIES IS STRICTLY PROHIBITED. IF YOU HAVE RECEIVED THIS
E-MAIL IN ERROR, PLEASE DELETE

IT.

- OUTAGE.dbf
- 111201R.xls
- 111201.xls ');

INSERT INTO email([from],[to],subject,body) VALUES('enron.announcements@enron.com',
'all_ena_egm_eim@enron.com', 'EWS Brown Bag', 'MARK YOUR LUNCH CALENDARS NOW !

You are invited to attend the EWS Brown Bag Lunch Series

Featuring: RAY BOWEN, COO

Topic: Enron Industrial Markets

Thursday, March 15, 2001

11:30 am - 12:30 pm

EB 5 C2

You bring your lunch, Limited Seating

We provide drinks and dessert. RSVP x 3-9610);

INSERT INTO email([from],[to],subject,body) VALUES('chris.germany@enron.com',
'ingrid.immer@williams.com', 'Re: About St Pauls', 'Sounds good to me. I bet this is next to the Warick?? Hotel.

"Immer, Ingrid" <Ingrid.Immer@Williams.com> on 12/21/2000 11:48:47 AM

To: ""chris.germany@enron.com"" <chris.germany@enron.com>

cc:

Subject: About St Pauls

<<About St Pauls.url>>

?

?<http://www.stpaulshouston.org/about.html>

Chris,

I like the looks of this place.? What do you think about going here Christmas eve?? They have an 11:00 a.m. service and a candlelight service at 5:00 p.m., among others.

Let me know.?? ii

- About St Pauls.url

);

INSERT INTO email([from],[to],subject,body) VALUES('nas@cpuc.ca.gov', 'skatz@sempratradng.com, kmccrea@sablau.com, thompson@wrightlaw.com,', 'Reply Brief filed July 31, 2000', '- CPUC01-#76371-v1-Revised_Reply_Brief__Due_today_7_31_.doc');

INSERT INTO email([from],[to],subject,body) VALUES('gascontrol@aglresources.com', 'dscott4@enron.com, lcampbel@enron.com', 'Alert Posted 10:00 AM November 20,2000: E-GAS Request Reminder', 'Alert Posted 10:00 AM November 20,2000: E-GAS Request Reminder

As discussed in the Winter Operations Meeting on Sept.29,2000, E-Gas(Emergency Gas) will not be offered this winter as a service from AGLC. Marketers and Poolers can receive gas via Peaking and IBSS nominations(daisy chain) from other marketers up to the 6 p.m. Same Day 2 nomination cycle.

);

INSERT INTO email([from],[to],subject,body) VALUES('dutch.quigley@enron.com', 'rwolkwitz@powermerchants.com', ", ' "

Here is a goody for you');

INSERT INTO email([from],[to],subject,body) VALUES('ryan.o"rourke@enron.com', 'k..allen@enron.com, randy.bhatia@enron.com, frank.ermis@enron.com,', 'TRV Notification: (West VaR - 11/07/2001)', 'The report named: West VaR

<http://trv.corp.enron.com/linkFromExcel.asp?report_cd=36&report_name=West+VaR&category_cd=2&category_name=WEST&toc_hide=1&sTV1=2&TV1Exp=Y¤t_efct_date=11/07/2001>, published as of 11/07/2001 is now available for viewing on the website.);

INSERT INTO email([from],[to],subject,body) VALUES('mjones7@txu.com', 'cstone1@txu.com, gggreen2@txu.com, timpowell@txu.com,', 'Enron / HPL Actuals for July 10, 2000', 'Teco Tap 10.000 / Enron ; 110.000 / HPL IFERC

LS HPL LSK IC 30.000 / Enron

);

INSERT INTO email([from],[to],subject,body) VALUES('susan.pereira@enron.com', 'kkw816@aol.com', 'soccer

practice', 'Kathy-

Is it safe to assume that practice is cancelled
for tonight??

Susan Pereira');

INSERT INTO email([from],[to],subject,body) VALUES('mark.whitt@enron.com', 'barry.tycholiz@enron.com',
'Huber Internal Memo', 'Please look at this. I didn't know how deep to go with the desk. Do you think this works.

');

INSERT INTO email([from],[to],subject,body) VALUES('m..forney@enron.com', 'george.phillips@enron.com', '',
'George,

Give me a call and we will further discuss opportunities on the 13st floor.

Thanks,

JMForney

3-7160');

INSERT INTO email([from],[to],subject,body) VALUES('brad.mckay@enron.com', 'angusmcka@aol.com', 'Re: (no
subject)', 'not yet');

INSERT INTO email([from],[to],subject,body) VALUES('adam.bayer@enron.com', 'jonathan.mckay@enron.com',
'FW: Curve Fetch File', 'Here is the curve fetch file sent to me. It has plenty of points in it. If you give me a list of
which ones you need we may be able to construct a secondary worksheet to vlookup the values.

adam

35227

-----Original Message-----

From: Royed, Jeff

Sent: Tuesday,

September 25, 2001 11:37 AM

To: Bayer, Adam

Subject: Curve Fetch File

Let me know if it works. It may be required to have a certain version of Oracle for it to work properly.

Jeff Royed

Enron

Energy Operations

Phone: 713-853-5295');

INSERT INTO email([from],[to],subject,body) VALUES('matt.smith@enron.com', 'yan.wang@enron.com', 'Report
Formats', 'Yan,

The merged reports look great. I believe the only orientation changes are to
"unmerge" the following six reports:

31 Keystone Receipts
15 Questar Pipeline
40 Rockies Production
22 West_2
23 West_3
25 CIG_WIC

The orientation of the individual reports should be correct. Thanks.

Mat

PS. Just a reminder to add the "*" by the title of calculated points.);
INSERT INTO email([from],[to],subject,body) VALUES('michelle.lokay@enron.com', 'jimboman@bigfoot.com',
'Egyptian Festival', '----- Forwarded by Michelle Lokay/ET&S/Enron on 09/07/2000
10:08 AM -----

"Karkour, Randa" <Randa.Karkour@COMPAQ.com>
on 09/07/2000 09:01:04 AM
To: ""Agheb (E-mail)" <Agheb@aol.com>, "Leila Mankarious (E-mail)"
<Leila_Mankarious@mhhs.org>, ""Marymankarious (E-mail)"
<marymankarious@aol.com>, "Michelle lokay (E-mail)" <mlokay@enron.com>, "Ramy
Mankarious (E-mail)" <Mankarious@aol.com>
cc:

Subject: Egyptian Festival

<<Egyptian Festival.url>>

<http://www.egyptianfestival.com/>

- Egyptian Festival.url
INSERT INTO email([from],[to],subject,body) VALUES('errol.mclaughlin@enron.com',
'sherry.dawson@enron.com', 'Urgent!!! --- New EAST books', 'This has to be done.....

Thanks
----- Forwarded by Errol McLaughlin/Corp/Enron on 12/20/2000
08:39 AM -----

From: William Kelly @ ECT 12/20/2000 08:31 AM

To: Kam Keiser/HOU/ECT@ECT, Darron C Giron/HOU/ECT@ECT, David
Baumbach/HOU/ECT@ECT, Errol McLaughlin/Corp/Enron@ENRON

cc: Kimat Singla/HOU/ECT@ECT, Kulvinder Fowler/NA/Enron@ENRON,
Kyle R
Lilly/HOU/ECT@ECT, Jeff Royed/Corp/Enron@ENRON, Alejandra
Chavez/NA/Enron@ENRON, Crystal Hyde/HOU/ECT@ECT

Subject: New EAST books

We have new book names in TAGG for our intramonth portfolios and it is extremely important that any deal booked to the East is communicated quickly to someone on my team. I know it will take some time for the new names to sink in and I do not want us to miss any positions or P&L.

Thanks for your help on this.

New:

Scott Neal : East Northeast

Dick Jenkins: East Marketeast

WK

);

INSERT INTO email([from],[to],subject,body) VALUES('david.forster@enron.com', 'eol.wide@enron.com', 'Change to Stack Manager', 'Effective immediately, there is a change to the Stack Manager which will affect any Inactive Child.

An inactive Child with links to Parent products will not have their calculated prices updated until the Child product is Activated.

When the Child Product is activated, the price will be recalculated and updated BEFORE it is displayed on the web.

This means that if you are inputting a basis price on a Child product, you will not see the final, calculated price until you Activate the product, at which time the customer will also see it.

If you have any questions, please contact the Help Desk on:

Americas: 713 853 4357

Europe: + 44 (0) 20 7783 7783

Asia/Australia: +61 2 9229 2300

Dave);

INSERT INTO email([from],[to],subject,body) VALUES('vince.kaminski@enron.com', 'jhh1@email.msn.com', 'Re: Light reading - see pieces beginning on page 7', 'John,

I saw it. Very interesting.

Vince

"John H Herbert" <jhh1@email.msn.com> on 07/28/2000 08:38:08 AM
To: "Vince J Kaminski" <Vince_J_Kaminski@enron.com>
cc:
Subject: Light reading - see pieces beginning on page 7

Cheers and have a nice weekend,

JHHerbert

- gd000728.pdf

');

INSERT INTO email([from],[to],subject,body) VALUES('matthew.lenhart@enron.com',
'mmmarcanel@equiva.com', 'RE:', 'i will try to line up a pig for you');

INSERT INTO

email([from],[to],subject,body) VALUES('jae.black@enron.com', 'claudette.harvey@enron.com,
chaun.roberts@enron.com, judy.martinez@enron.com,', 'Disaster Recovery Equipment', 'As a reminder...there are
several pieces of equipment that are set up on the 30th Floor, as well as on our floor, for the Disaster Recovery
Team. PLEASE DO NOT TAKE, BORROW OR USE this equipment. Should you need to use another computer
system, other than yours, or make conference calls please work with your Assistant to help find or set up equipment
for you to use.

Thanks for your understanding in this matter.

T.Jae Black

East Power Trading

Assistant to Kevin Presto

off. 713-853-5800

fax 713-646-8272

cell 713-539-4760');

INSERT INTO email([from],[to],subject,body) VALUES('eric.bass@enron.com', 'dale.neuner@enron.com', '5 X
24', 'Dale,

Have you heard anything more on the 5 X 24s? We would like to get this
product out ASAP.

Thanks,

Eric');

INSERT INTO email([from],[to],subject,body) VALUES('messenger@smartreminders.com',
'm..tholt@enron.com', '10% Coupon - PrintPal Printer Cartridges - 100% Guaranteed', '[IMAGE]
[IMAGE][IMAGE][IMAGE]

Dear SmartReminders Member,

[IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE] [IMAGE]

We respect your privacy and are a Certified Participant of the BBBOnLine
Privacy Program. To be removed from future offers,click here.

SmartReminders.com is a permission based service. To unsubscribe click here . ');

INSERT INTO email([from],[to],subject,body) VALUES('benjamin.rogers@enron.com',
'mark.bernstein@enron.com', ", 'The guy you are talking about left CIN under a "cloud of suspicion" sort of
speak. He was the one who got into several bad deals and PPA's in California
for CIN, thus he left on a bad note. Let me know if you need more detail
than that, I felt this was the type of info you were looking for. Thanks!

Ben');

INSERT INTO email([from],[to],subject,body)

VALUES('enron_update@concreworkplace.com', 'michelle.cash@enron.com', 'Expense Report Receipts Not
Received', 'Employee Name: Michelle Cash
Report Name: Houston Cellular 8-11-01
Report Date: 12/13/01
Report ID: 594D37C9ED2111D5B452
Submitted On: 12/13/01

You are only allowed 2 reports with receipts outstanding. Your expense reports will not be paid until you meet this

requirement.');

INSERT INTO email([from],[to],subject,body) VALUES('susan.mara@enron.com', 'ray.alvarez@enron.com, mark.palmer@enron.com, karen.denne@enron.com,', 'CAISO Emergency Motion -- to discontinue market-based rates for', 'FYI. the latest broadside against the generators.

Sue Mara

Enron Corp.

Tel: (415) 782-7802

Fax:(415) 782-7854

----- Forwarded by Susan J Mara/NA/Enron on 06/08/2001 12:24 PM -----

"Milner, Marcie" <MMilner@coral-energy.com> 06/08/2001 11:13 AM To: ""smara@enron.com"" <smara@enron.com> cc: Subject: CAISO Emergency Motion

Sue, did you see this emergency motion the CAISO filed today? Apparently they are requesting that FERC discontinue market-based rates immediately and grant refunds plus interest on the difference between cost-based rates and market revenues received back to May 2000. They are requesting the commission act within 14 days. Have you heard anything about what they are doing?

Marcie

<http://www.caiso.com/docs/2001/06/08/200106081005526469.pdf>

');

INSERT INTO email([from],[to],subject,body) VALUES('fletcher.sturm@enron.com', 'eloy.escobar@enron.com', 'Re: General Brinks Position Meeting', 'Eloy,

Who is General Brinks?

Fletch');

INSERT INTO email([from],[to],subject,body) VALUES('nailia.dindarova@enron.com', 'richard.shapiro@enron.com', 'Documents for Mark Frevert (on EU developments and lessons from', 'Rick,

Here are the documents that Peter has prepared for Mark Frevert.

Nailia

----- Forwarded by Nailia Dindarova/LON/ECT on 25/06/2001

16:36 -----

Nailia Dindarova

25/06/2001

15:36

To: Michael Brown/Enron@EUEnronXGate

cc: Ross Sankey/Enron@EUEnronXGate, Eric Shaw/ENRON@EUEnronXGate, Peter Styles/LON/ECT@ECT

Subject: Documents for Mark Frevert (on EU developments and lessons from California)

Michael,

These are the documents that Peter promised to give to you for Mark Frevert. He has now handed them to him in person but asked me to transmit them electronically to you, as well as Eric and Ross.

Nailia

);
INSERT INTO email([from],[to],subject,body) VALUES('peggy.a.kostial@accenture.com', 'dave.samuels@enron.com', 'EOL-Accenture Deal Sheet', 'Dave -

Attached are our comments and suggested changes. Please call to review.

On the time line for completion, we have four critical steps to complete:

- Finalize market analysis to refine business case, specifically projected revenue stream
- Complete counterparty surveying, including targeting 3 CPs for letters of intent
- Review Enron asset base for potential reuse/ licensing
- Contract negotiations

Joe will come back to us with an updated time line, but it is my expectation that we are still on the same schedule (we just begun week three) with possibly a week or so slippage.....contract negotiations will probably be the critical path.

We will send our cut at the actual time line here shortly. Thanks,

Peggy

(See attached file: accenture-dealpoints v2.doc)

- accenture-dealpoints v2.doc ');

INSERT INTO email([from],[to],subject,body) VALUES('thomas.martin@enron.com', 'thomas.martin@enron.com', 'Re: Guadalupe Power Partners LP', '----- Forwarded by Thomas A Martin/HOU/ECT on 03/20/2001 03:49 PM -----

Thomas A Martin
10/11/2000 03:55 PM
To: Patrick Wade/HOU/ECT@ECT
cc:
Subject: Re: Guadalupe Power Partners LP

The deal is physically served at Oasis Waha or Oasis Katy and is priced at either HSC, Waha or Katytailgate GD at buyers option three days prior to NYMEX close.

);
INSERT INTO email([from],[to],subject,body)
VALUES('judy.townsend@enron.com', 'dan.junek@enron.com, chris.germany@enron.com', 'Columbia Distribution's Capacity Available for Release - Sum', '----- Forwarded by Judy Townsend/HOU/ECT on 03/09/2001 11:04 AM -----

agoddard@nsource.com on 03/08/2001 09:16:57 AM
To: " - *Koch, Kent" <kkoch@nsource.com>, " - *Millar, Debra" <dmillar@nsource.com>, " - *Burke, Lynn" <lburke@nsource.com>
cc: " - *Heckathorn, Tom" <heckathorn@nsource.com>
Subject: Columbia Distribution's Capacity Available for Release - Sum

Attached is Columbia Distribution's notice of capacity available for release for the summer of 2001 (Apr. 2001 through Oct. 2001).

Please note that the deadline for bids is 3:00pm EST on March 20, 2001.

If you have any questions, feel free to contact any of the representatives listed at the bottom of the attachment.

Aaron Goddard

- 2001Summer.doc

);
INSERT INTO
email([from],[to],subject,body) VALUES('rhonda.denton@enron.com', 'tim.belden@enron.com, dana.davis@enron.com, genia.fitzgerald@enron.com,', 'Split Rock Energy LLC', 'We have received the executed

EEl contract from this CP dated 12/12/2000.

Copies will be distributed to Legal and Credit.');

INSERT INTO email([from],[to],subject,body) VALUES('kerrymcelroy@dwt.com', 'jack.speer@alcoa.com, crow@millernash.com, michaelearly@earthlink.net,', 'Oral Argument Request', ' - Oral Argument Request.doc');
INSERT INTO email([from],[to],subject,body) VALUES('mike.carson@enron.com', 'rlmichaelis@hormel.com', ", 'Did you come in town this wk end..... My new number at our house is :
713-668-3712..... my cell # is 281-381-7332

the kid');

INSERT INTO email([from],[to],subject,body) VALUES('cooper.richey@enron.com', 'trycooper@hotmail.com', 'FW: Contact Info', '

-----Original Message-----

From: Punja, Karim
Sent: Thursday, December 13, 2001 2:35 PM
To: Richey, Cooper
Subject: Contact Info

Cooper,

Its

been a real pleasure working with you (even though it was for only a small amount of time)
I hope we can stay in touch.

Home# 234-0249
email: kpunja@hotmail.com

Take Care,

Karim.

');

INSERT INTO email([from],[to],subject,body) VALUES('bjm30@earthlink.net', 'mcguinn.k@enron.com, mcguinn.ian@enron.com, mcguinn.stephen@enron.com,', 'email address change', 'Hello all.

I haven't talked to many of you via email recently but I do want to give you
my new address for your email file:

bjm30@earthlink.net

I hope all is well.

Brian McGuinn');

INSERT INTO email([from],[to],subject,body) VALUES('shelley.corman@enron.com', 'steve.hotte@enron.com', 'Flat Panels', 'Can you please advise what is going on with the flat panels that we had planned to distribute to our gas logistics team. It was in the budget and we had the okay, but now I'm hearing there is some hold-up & the units are stored on 44.

Shelley');

INSERT INTO email([from],[to],subject,body) VALUES('sara.davidson@enron.com',
'john.schwartzenburg@enron.com, scott.dieball@enron.com, recipients@enron.com,', '2001 Enron Law Conference
(Distribution List 2)', ' Enron Law Conference

San Antonio, Texas May 2-4, 2001 Westin Riverwalk

See attached memo for more details!!

? Registration for the law conference this year will be handled through an
Online RSVP Form on the Enron Law Conference Website at
<http://lawconference.corp.enron.com>. The website is still under construction
and will not be available until Thursday, March 15, 2001.

? We will send you another e-mail to confirm when the Law Conference Website
is operational.

? Please complete the Online RSVP Form as soon as it is available and submit
it no later than Friday, March 30th.

');

INSERT INTO email([from],[to],subject,body) VALUES('tori.kuykendall@enron.com',
'heath.b.taylor@accenture.com', 'Re:', 'hey - thats funny about john - he definitely remembers him - i'll call pat
and let him know - we are
coming on saturday - i just havent had a chance to
call you guys back -- looking forward to it -- i probably need the
directions again though');

INSERT INTO email([from],[to],subject,body) VALUES('darron.giron@enron.com', 'bryce.baxter@enron.com',
'Re: Feedback for Audrey Cook', 'Bryce,

I'll get it done today.

DG 3-9573

From: Bryce Baxter

06/12/2000 07:15 PM

To: Darron C Giron/HOU/ECT@ECT

cc:

Subject: Feedback for Audrey Cook

You were identified as a reviewer for Audrey Cook. If possible, could you complete her feedback by end of business Wednesday? It will really help me in the PRC process to have your input. Thanks.

);

```
INSERT INTO email([from],[to],subject,body) VALUES('casey.evans@enron.com', 'stephanie.sever@enron.com', 'Gas EOL ID', 'Stephanie,
```

In conjunction with the recent movement of several power traders, they are changing the names of their gas books as well. The names of the new gas books and traders are as follows:

PWR-NG-LT-SPP:

Mike Carson

PWR-NG-LT-SERC: Jeff King

If you need to know their power desk to map their ID to their gas books, those desks are as follows:

EPMI-LT-SPP: Mike Carson

EPMI-LT-SERC: Jeff King

I will be in training this afternoon, but will be back when class is over. Let me know if you have any questions.

Thanks for your help!

Casey');

```
INSERT INTO email([from],[to],subject,body) VALUES('darrell.schoolcraft@enron.com', 'david.roensch@enron.com, kimberly.watson@enron.com, michelle.lokay@enron.com,', 'Postings', 'Please see the attached.
```

ds

);

```
INSERT INTO email([from],[to],subject,body) VALUES('mcominsky@aol.com', 'cpatman@bracepatt.com, james_derrick@enron.com', 'Jurisprudence Luncheon', 'Carrin & Jim --
```

It was an honor and a pleasure to meet both of you yesterday. I know we will have fun working together on this very special event.

Jeff left the jurisprudence luncheon lists for me before he left on vacation.

I wasn't sure whether he transmitted

them to you as well. Would you please

advise me if you would like them sent to you? I can email the MS Excel files or I can fax the hard copies to you. Please advise what is most convenient.

I plan to be in town through the holidays and can be reached by phone, email, or cell phone at any time. My cell phone number is 713/705-4829.

Thanks again for your interest in the ADL's work. Martin.

Martin B. Cominsky

Director, Southwest Region

Anti-Defamation League

713/627-3490, ext. 122

713/627-2011 (fax)

MCominsky@aol.com');

INSERT INTO email([from],[to],subject,body) VALUES('phillip.love@enron.com', 'todagost@utmb.edu, gbsonnta@utmb.edu', 'New President', 'I had a little bird put a word in my ear. Is there any possibility for Ben Raimer to be Bush's secretary of HHS? Just curious about that infamous UTMB rumor mill. Hope things are well, happy holidays.

PL');

INSERT INTO email([from],[to],subject,body) VALUES('marie.heard@enron.com', 'ehamilton@fna.com', 'ISDA Master Agreement',

'Erin:

Pursuant to your request, attached are the Schedule to the ISDA Master Agreement, together with Paragraph 13 to the ISDA Credit Support Annex. Please let me know if you need anything else. We look forward to hearing your comments.

Marie

Marie Heard

Senior Legal Specialist

Enron North America Corp.

Phone: (713) 853-3907

Fax: (713) 646-3490

marie.heard@enron.com

');

INSERT INTO email([from],[to],subject,body) VALUES('andrea.ring@enron.com', 'beverly.beaty@enron.com', 'Re: Tennessee Buy - Louis Dreyfus', 'Beverly - once again thanks so much for your help on this.

');

INSERT INTO email([from],[to],subject,body) VALUES('karolyn.criado@enron.com', 'j..bonin@enron.com, felicia.case@enron.com, b..clapp@enron.com,', 'Price List week of Oct. 8-9, 2001', '

Please contact me if you have any questions regarding last weeks prices.

Thank you,

Karolyn Criado

3-9441

');

INSERT INTO email([from],[to],subject,body)

VALUES('kevin.presto@enron.com', 'edward.baughman@enron.com, billy.braddock@enron.com', 'Associated',
'Please begin working on filling our Associated short position in 02. I would like to take this risk off the books.

In addition, please find out what a buy-out of VEPCO would cost us. With Rogers transitioning to run our retail risk management, I would like to clean up our customer positions.

We also need to continue to explore a JEA buy-out.

Thanks.');

INSERT INTO email([from],[to],subject,body) VALUES('stacy.dickson@enron.com', 'gregg.penman@enron.com',
'RE: Constellation TC 5-7-01', 'Gregg,

I am at home with a sick baby. (Lots of fun!) I will call you about this tomorrow.

Stacy');

INSERT INTO email([from],[to],subject,body) VALUES('joe.quenet@enron.com', 'dfincher@utilicorp.com', ", 'hey
big guy.....check this out.....

w ww.gorelieberman-2000.com/');

INSERT INTO email([from],[to],subject,body) VALUES('k..allen@enron.com', 'jacqestc@aol.com', ",
'Jacques,

I sent you a fax of Kevin Kolb's comments on the release. The payoff on the note would be \$36,248 (\$36090(principal) + \$158 (accrued interest)).

This is assuming we wrap this up on Tuesday.

Please email to confirm that their changes are ok so I can set up a meeting on Tuesday to reach closure.

Phillip');

INSERT INTO email([from],[to],subject,body) VALUES('kourtney.nelson@enron.com',
'mike.swerzbin@enron.com', 'Adjusted L/R Balance', 'Mike,

I placed the adjusted L/R Balance on the Enronwest site. It is under the "Staff/Kourtney Nelson". There are two links:

- 1) "Adj L_R" is the same data/format from the weekly strategy meeting.
- 2) "New Gen 2001_2002" link has all of the supply side info that is used to calculate the L/R balance
-Please note the Data Flag column, a value of "3" indicates the project was cancelled, on hold, etc and is not included in the calc.

Both of these sheets are interactive Excel spreadsheets and thus you can play around with the data

as you please. Also, James Bruce is working to get his gen report on the web. That will help with your access to information on new gen.

Please let me know if you have any questions or feedback,

Kourtney

Kourtney Nelson

Fundamental Analysis

Enron North America

(503) 464-8280

kourtney.nelson@enron.com');

INSERT INTO email([from],[to],subject,body) VALUES('d..thomas@enron.com', 'naveed.ahmed@enron.com', 'FW: Current Enron TCC Portfolio', '

-----Original Message-----

From: Grace, Rebecca M.

Sent: Monday, December 17, 2001 9:44 AM

To: Thomas, Paul D.

Cc: Cashion, Jim; Allen, Thresa A.; May, Tom

Subject: RE: Current Enron TCC Portfolio

Paul,

I reviewed NY's list. I agree with all of their contracts numbers and mw amounts.

Call if you have any more questions.

Rebecca

-----Original Message-----

From: Thomas, Paul D.

Sent: Monday, December 17, 2001 9:08 AM

To: Grace, Rebecca M.

Subject: FW: Current Enron TCC Portfolio

<< File: enrontccs.xls >>

Rebecca,

Let me know if

you see any differences.

Paul

X 3-0403

-----Original Message-----

From: Thomas, Paul D.
Sent: Monday, December 17, 2001 9:04 AM
To: Ahmed, Naveed
Subject: FW: Current Enron TCC Portfolio

-----Original Message-----

From: Thomas, Paul D.
Sent: Thursday, December 13, 2001 10:01 AM
To: Baughman, Edward D.
Subject: Current Enron TCC Portfolio

);
INSERT INTO email([from],[to],subject,body) VALUES('stephanie.panus@enron.com',
'william.bradford@enron.com, debbie.brackett@enron.com,', 'Coastal Merchant Energy/El Paso Merchant Energy',
'Coastal Merchant Energy, L.P. merged with and into El Paso Merchant Energy,
L.P., effective February 1, 2001, with the surviving entity being El Paso
Merchant Energy, L.P. We currently have ISDA Master Agreements with both
counterparties. Please see the attached memo regarding the existing Masters
and let us know which agreement should be terminated.

Thanks,
Stephanie

);
INSERT INTO email([from],[to],subject,body) VALUES('kam.keiser@enron.com',
'c..kenne@enron.com', 'RE: What about this too???' , '

-----Original Message-----

From: Kenne, Dawn C.
Sent: Wednesday, February 06, 2002 11:50 AM
To: Keiser, Kam
Subject: What about this too???

<< File: Netco Trader Matrix.xls >>

);
INSERT INTO email([from],[to],subject,body) VALUES('chris.meyer@enron.com', 'joe.parks@enron.com',
'Centana', 'Talked to Chip. We do need Cash Committe approval given the netting feature of your deal, which
means Batch Funding Request. Please update per my previous e-mail and forward.

Thanks

chris
x31666');

INSERT INTO email([from],[to],subject,body) VALUES('debra.perlingiere@enron.com',
'jworman@academyofhealth.com', '', 'Have a great weekend! Happy Fathers Day!')

Debra Perlingiere

Enron North America Corp.

1400 Smith Street, EB 3885

Houston, Texas 77002

dperlin@enron.com

Phone 713-853-7658

Fax 713-646-3490);

INSERT INTO email([from],[to],subject,body) VALUES('outlook.team@enron.com', '', 'Demo by Martha Janousek
of Dashboard & Pipeline

Profile / Julia &', 'CALENDAR ENTRY: APPOINTMENT

Description:

Demo by Martha Janousek of Dashboard & Pipeline Profile / Julia & Dir Rpts. - 4102

Date: 1/5/2001

Time: 9:00 AM - 10:00 AM (Central Standard Time)

Chairperson: Outlook Migration Team

Detailed Description:');

INSERT INTO email([from],[to],subject,body) VALUES('diana.seifert@enron.com', 'mark.taylor@enron.com',
'Guest access Chile', 'Hello Mark,

Justin Boyd told me that you can help me with questions regarding Chile.

We got a request for guest access through MG.

The company is called Escondida and is a subsidiary of BHP Australia.

Please advise if I can set up a guest account or not.

F.Y.I.: MG is planning to put a "in w/h Chile" contract for Copper on-line as
soon as Enron has done the due diligence for this country.

Thanks !

Best regards

Diana Seifert

EOL PCG');

INSERT INTO email([from],[to],subject,body) VALUES('enron_update@concuere workplace.com',
'mark.whitt@enron.com', '<<Concur Expense Document>> - 121001',

'The Approval status has changed on the following report:

Status last changed by: Barry L. Tycholiz

Expense Report Name: 121001

Report Total: \$198.98

Amount Due Employee: \$198.98

Amount Approved: \$198.98

Amount Paid: \$0.00

Approval Status: Approved

Payment Status: Pending

To review this expense report, click on the following link for Concur Expense.

<http://expense.ms.enron.com>);

INSERT INTO email([from],[to],subject,body) VALUES('kevin.hyatt@enron.com', '', 'Technical Support', 'Outside the U.S., please refer to the list below:

Australia:

1800 678-515

support@palm-au.com

Canada:

1905 305-6530

support@palm.com

New Zealand:

0800 446-398

support@palm-nz.com

U.K.:

0171 867 0108

eurosupport@palm.3com.com

Please refer to the Worldwide Customer Support card for a complete technical support contact list.');

INSERT INTO email([from],[to],subject,body) VALUES('geoff.storey@enron.com', 'dutch.quigley@enron.com', 'RE:', 'duke contact?'

-----Original Message-----

From: Quigley, Dutch

Sent: Wednesday, October 31, 2001 10:14 AM

To: Storey, Geoff

Subject: RE:

bp corp Albert LaMore 281-366-4962

running the reports now

-----Original Message-----

From: Storey, Geoff

Sent: Wednesday, October 31, 2001 10:10 AM

To: Quigley, Dutch

Subject: RE:

give me a contact over there too
BP

-----Original Message-----

From: Quigley, Dutch
Sent: Wednesday, October 31, 2001 9:42 AM
To: Storey, Geoff
Subject:

Coral Jeff Whitnah 713-767-5374
Relaint Steve McGinn 713-207-4000);
INSERT INTO email([from],[to],subject,body) VALUES('pete.davis@enron.com', 'pete.davis@enron.com', 'Start
Date: 4/22/01; HourAhead hour: 3; <CODESITE>', 'Start Date: 4/22/01; HourAhead hour: 3; No ancillary
schedules awarded.
Variances detected.
Variances detected in Load schedule.

LOG MESSAGES:

PARSING FILE -->> O:\Portland\WestDesk\California Scheduling\ISO Final
Schedules\2001042203.txt

---- Load Schedule ----

\$\$\$ Variance found in table tblLoads.

Details: (Hour: 3 / Preferred:
1.92 / Final: 1.89)

TRANS_TYPE: FINAL

LOAD_ID: PGE4

MKT_TYPE: 2

TRANS_DATE: 4/22/01

SC_ID: EPMI

);

INSERT INTO email([from],[to],subject,body) VALUES('john.postlethwaite@enron.com',
'john.zufferli@enron.com', 'Reference', 'John, hope things are going well up there for you. The big day is almost
here for you and Jessica. I was wondering if I could use your name as a job reference if need be. I am just trying to
get everything in order just in case something happens.

John');

INSERT INTO email([from],[to],subject,body) VALUES('jeffrey.shankman@enron.com',
'Ischiffm@jonesday.com', 'Re:', 'I saw you called on the cell this a.m. Sorry I missed you. (I was in the
shower). I have had a shitty week--I suspect my silence (not only to you,
but others) after our phone call is a result of the week. I'm seeing Glen at
11:15....talk to you');

INSERT INTO email([from],[to],subject,body) VALUES('litebytz@enron.com', ', 'Lite Bytz RSVP', '

This week's Lite Bytz presentation
will feature the following TOOLZ speaker:

Richard McDougall
Solaris 8
Thursday, June 7, 2001

If you have not already signed up, please RSVP via email to litebytz@enron.com by the end of the day Tuesday, June 5, 2001.

*Remember: this is now a Brown Bag Event--so bring your lunch and we will provide cookies and drinks.

Click below for more details.

```
http://home.enron.com:84/messaging/litebytztoolzprint.jpg');  
  COMMIT;  
}  
} {}
```

```
#####  
# Everything above just builds an interesting test database. The actual  
# tests come after this comment.  
#####
```

```
do_test fts3ac-1.2 {  
  execsql {  
    SELECT rowid FROM email WHERE email MATCH 'mark'  
  }  
} {6 17 25 38 40 42 73 74}  
do_test fts3ac-1.3 {  
  execsql {  
    SELECT rowid FROM email WHERE email MATCH 'susan'  
  }  
} {24 40}  
do_test fts3ac-1.4 {  
  execsql {  
    SELECT rowid FROM email WHERE email MATCH  
'mark susan'  
  }  
} {40}  
do_test fts3ac-1.5 {  
  execsql {  
    SELECT rowid FROM email WHERE email MATCH 'susan mark'  
  }  
} {40}  
do_test fts3ac-1.6 {  
  execsql {  
    SELECT rowid FROM email WHERE email MATCH "'mark susan'"
```

```

}
} {}
do_test fts3ac-1.7 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark -susan'
  }
} {6 17 25 38 42 73 74}
do_test fts3ac-1.8 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH '-mark susan'
  }
} {24}
do_test fts3ac-1.9 {
  execsql {
    SELECT rowid FROM email WHERE email MATCH 'mark OR susan'
  }
} {6 17 24 25 38 40 42 73 74}

# Some simple tests of the automatic "offsets(email)" column. In the sample
# data set above, only one message, number 20, contains the words
# "gas" and "reminder" in both body and subject.
#
do_test fts3ac-2.1 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE email MATCH 'gas reminder'
  }
} {20 {2 0 42 3 2 1 54 8 3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}
do_test fts3ac-2.2 {

  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE email MATCH 'subject:gas reminder'
  }
} {20 {2 0 42 3 2 1 54 8 3 1 54 8}}
do_test fts3ac-2.3 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE email MATCH 'body:gas reminder'
  }
} {20 {2 1 54 8 3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}
do_test fts3ac-2.4 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE subject MATCH 'gas reminder'
  }
} {20 {2 0 42 3 2 1 54 8}}
do_test fts3ac-2.5 {

```

```

execsql {
  SELECT rowid, offsets(email) FROM email
  WHERE body MATCH 'gas reminder'
}
} {20 {3 0 42 3 3 1 54 8 3 0 129 3 3 0 143 3 3 0 240 3}}

# Document 32 contains 5 instances of the word "child". But only
# 3 of them are paired with "product". Make sure only those instances
# that match the phrase appear in the offsets(email) list.
#
do_test fts3ac-3.1 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE body MATCH 'child product' AND +rowid=32
  }
} {32 {3 0 94
5 3 0 114 5 3 0 207 5 3 1 213 7 3 0 245 5 3 1 251 7 3 0 409 5 3 1 415 7 3 1 493 7}}
do_test fts3ac-3.2 {
  execsql {
    SELECT rowid, offsets(email) FROM email
    WHERE body MATCH "'child product'"
  }
} {32 {3 0 207 5 3 1 213 7 3 0 245 5 3 1 251 7 3 0 409 5 3 1 415 7}}

# Snippet generator tests
#
do_test fts3ac-4.1 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'subject:gas reminder'
  }
} {{Alert Posted 10:00 AM November 20,2000: E-<b>GAS</b> Request <b>Reminder</b>}}
do_test fts3ac-4.2 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'christmas candlelight'
  }
} {{<b>...</b> place.? What do you think about going here <b>Christmas</b>
eve?? They have an 11:00 a.m. service and a <b>candlelight</b> service at 5:00 p.m.,
among others. <b>...</b>}}

do_test fts3ac-4.3 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'deal sheet potential reuse'
  }
} {{EOL-Accenture <b>Deal</b> <b>Sheet</b> <b>...</b> intent

```

```

    Review Enron asset base for <b>potential</b> <b>reuse</b>/ licensing
    Contract negotiations <b>...</b>}}
do_test fts3ac-4.4 {
execsql {
    SELECT snippet(email,'<<<','>>>',') FROM email
    WHERE email MATCH 'deal sheet potential reuse'
}
} {{EOL-Accenture <<<Deal>>> <<<Sheet>>> intent
    Review Enron asset base for <<<potential>>> <<<reuse>>>/ licensing
    Contract negotiations }}
do_test fts3ac-4.5 {
execsql {
    SELECT snippet(email,'<<<','>>>',') FROM email
    WHERE email MATCH 'first things'
}
} {{Re: <<<First>>> Polish Deal! Congrats! <<<Things>>> seem to be building rapidly now on the }}
do_test fts3ac-4.6 {
execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'chris is here'
}
} {{<b>chris</b>.germany@enron.com <b>...</b> Sounds good to me. I bet this <b>is</b> next to the Warick??
Hotel. <b>...</b> place.? What do you think about going <b>here</b> Christmas
eve?? They have an 11:00 a.m. <b>...</b>}}
do_test fts3ac-4.7
{
execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH "pursuant to"
}
} {{Erin:

<b>Pursuant</b> <b>to</b> your request, attached are the Schedule to <b>...</b>}}
do_test fts3ac-4.8 {
execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'ancillary load davis'
}
} {{pete.<b>davis</b>@enron.com <b>...</b> Start Date: 4/22/01; HourAhead hour: 3; No <b>ancillary</b>
schedules awarded.
Variances detected.
Variances detected in <b>Load</b> schedule.

LOG MESSAGES:

PARSING <b>...</b>}}

# Combinations of AND and OR operators:

```



```
#
do_test fts3ac-5.1 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'questar enron OR com'
  }
} {{matt.smith@<b>enron</b>.<b>com</b> <b>...</b> six reports:
```

```
31 Keystone Receipts
15 <b>Questar</b> Pipeline
40 Rockies Production
22 West_2 <b>...</b>}}
```

```
do_test fts3ac-5.2 {
  execsql {
    SELECT snippet(email) FROM email
    WHERE email MATCH 'enron OR com questar'
  }
} {{matt.smith@<b>enron</b>.<b>com</b>
<b>...</b> six reports:
```

```
31 Keystone Receipts
15 <b>Questar</b> Pipeline
40 Rockies Production
22 West_2 <b>...</b>}}
```

finish_test

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/test/fts3ac.test
No license file was found, but licenses were detected in source scan.
```

public domain and is thus free for

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/about.html
No license file was found, but licenses were detected in source scan.
```

Suppose the demo_data.boundary field holds some proprietary data description

Found in path(s):

```
* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/rtree.html
No license file was found, but licenses were detected in source scan.
```

/*

```
** CAPI3REF: Configuration Options {H10160} <S20000>
```

** EXPERIMENTAL

**

** These constants are the available integer configuration options that
** can be passed as the first argument to the [sqlite3_config()] interface.

**

** New configuration options may be added in future releases of SQLite.

** Existing configuration options might be discontinued. Applications
** should check the return code from [sqlite3_config()] to make sure that
** the call worked. The [sqlite3_config()] interface will return a
** non-zero [error code] if a discontinued or unsupported configuration option
** is invoked.

**

** <dl>

** <dt>SQLITE_CONFIG_SINGLETHREAD</dt>

** <dd>There are no arguments to this option. This option disables
** all mutexing and puts SQLite into a mode where it can only be used
** by a single thread.</dd>

**

** <dt>SQLITE_CONFIG_MULTITHREAD</dt>

** <dd>There are no arguments to this option. This option disables

**

mutexing on [database connection] and [prepared statement] objects.

** The application is responsible for serializing access to
** [database connections] and [prepared statements]. But other mutexes
** are enabled so that SQLite will be safe to use in a multi-threaded
** environment as long as no two threads attempt to use the same
** [database connection] at the same time. See the [threading mode]
** documentation for additional information.</dd>

**

** <dt>SQLITE_CONFIG_SERIALIZED</dt>

** <dd>There are no arguments to this option. This option enables
** all mutexes including the recursive
** mutexes on [database connection] and [prepared statement] objects.
** In this mode (which is the default when SQLite is compiled with
** [SQLITE_THREADSAFE=1]) the SQLite library will itself serialize access
** to [database connections] and [prepared statements] so that the
** application is free to use the same [database connection] or the
** same [prepared statement] in different threads at
the same time.

** See the [threading mode] documentation for additional information.</dd>

**

** <dt>SQLITE_CONFIG_MALLOC</dt>

** <dd>This option takes a single argument which is a pointer to an
** instance of the [sqlite3_mem_methods] structure. The argument specifies
** alternative low-level memory allocation routines to be used in place of
** the memory allocation routines built into SQLite.</dd>

**

** <dt>SQLITE_CONFIG_GETMALLOC</dt>

**** <dd>**This option takes a single argument which is a pointer to an instance of the [sqlite3_mem_methods] structure. The [sqlite3_mem_methods] structure is filled with the currently defined memory allocation routines. This option can be used to overload the default memory allocation routines with a wrapper that simulations memory allocation failure or tracks memory usage, for example.</dd>

**** <dt>SQLITE_CONFIG_MEMSTATUS</dt>**

**** <dd>**This option takes single argument of type int, interpreted as a boolean, which enables or disables the collection of memory allocation statistics. When disabled, the following SQLite interfaces become non-operational:

**** **

**** **[sqlite3_memory_used()]

**** **[sqlite3_memory_highwater()]

**** **[sqlite3_soft_heap_limit()]

**** **[sqlite3_status()]

**** **

**** </dd>**

**** <dt>SQLITE_CONFIG_SCRATCH</dt>**

**** <dd>**This option specifies a static memory buffer that SQLite can use for scratch memory. There are three arguments: A pointer an 8-byte aligned memory buffer from which the scratch allocations will be drawn, the size of each scratch allocation (sz), and the maximum number of scratch allocations (N). The sz argument must be a multiple of 16. The sz parameter should be a few bytes larger than the actual scratch space required due to internal overhead. The first argument should pointer to an 8-byte aligned buffer of at least sz*N bytes of memory. SQLite will use no more than one scratch buffer at once per thread, so N should

be set to the expected maximum number of threads. The sz parameter should be 6 times the size of the largest database page size. Scratch buffers are used as part of the btree balance operation. If The btree balancer needs additional memory beyond what is provided by scratch buffers or if no scratch buffer space is specified, then SQLite goes to [sqlite3_malloc()] to obtain the memory it needs.</dd>

**** <dt>SQLITE_CONFIG_PAGECACHE</dt>**

**** <dd>**This option specifies a static memory buffer that SQLite can use for the database page cache with the default page cache implementation. This configuration should not be used if an application-define page cache implementation is loaded using the SQLITE_CONFIG_PCACHE option.

**** There are three arguments to this option: A pointer to 8-byte aligned memory, the size of each page buffer (sz), and the number of pages (N).**

**** The sz argument should be the size of the largest database page**

** (a power of two between 512 and 32768) plus a little extra for each page header. The page header size is 20 to 40 bytes depending on the host architecture. It is harmless, apart from the wasted memory, to make sz a little too large. The first argument should point to an allocation of at least sz*N bytes of memory. SQLite will use the memory provided by the first argument to satisfy its memory needs for the first N pages that it adds to cache. If additional page cache memory is needed beyond what is provided by this option, then SQLite goes to [sqlite3_malloc()] for the additional storage space. The implementation might use one or more of the N buffers to hold memory accounting information. The pointer in the first argument must be aligned to an 8-byte boundary or subsequent behavior of SQLite will be undefined.</dd>

** <dt>SQLITE_CONFIG_HEAP</dt>

** <dd>This option specifies a static memory buffer that SQLite will use for all of its dynamic memory allocation needs beyond those provided for by [SQLITE_CONFIG_SCRATCH] and [SQLITE_CONFIG_PAGECACHE]. There are three arguments: An 8-byte aligned pointer to the memory, the number of bytes in the memory buffer, and the minimum allocation size. If the first pointer (the memory pointer) is NULL, then SQLite reverts to using its default memory allocator (the system malloc() implementation), undoing any prior invocation of [SQLITE_CONFIG_MALLOC]. If the memory pointer is not NULL and either [SQLITE_ENABLE_MEMSYS3] or [SQLITE_ENABLE_MEMSYS5] are defined, then the alternative memory allocator is engaged to handle all of SQLite's memory allocation needs. The first pointer (the memory pointer) must be aligned to an 8-byte boundary or subsequent behavior of SQLite will be undefined.</dd>

** <dt>SQLITE_CONFIG_MUTEX</dt>

** <dd>This option takes a single argument which is a pointer to an instance of the [sqlite3_mutex_methods] structure. The argument specifies alternative low-level mutex routines to be used in place of the mutex routines built into SQLite.</dd>

** <dt>SQLITE_CONFIG_GETMUTEX</dt>

** <dd>This option takes a single argument which is a pointer to an instance of the [sqlite3_mutex_methods] structure. The [sqlite3_mutex_methods] structure is filled with the currently defined mutex routines. This option can be used to overload the default mutex allocation routines with a wrapper used to track mutex usage for performance profiling or testing, for example.</dd>

** <dt>SQLITE_CONFIG_LOOKASIDE</dt>

```

** <dd>This option takes two arguments that determine the default
** memory allocation lookaside optimization. The first argument is the
** size of each lookaside buffer slot and the second is the number of
** slots allocated to each database connection. This option sets the
** <i>default</i> lookaside size. The [SQLITE_DBCONFIG_LOOKASIDE]
** verb to [sqlite3_db_config()] can be used to change the lookaside
** configuration on individual
connections.</dd>
**
** <dt>SQLITE_CONFIG_PCACHE</dt>
** <dd>This option takes a single argument which is a pointer to
** an [sqlite3_pcache_methods] object. This object specifies the interface
** to a custom page cache implementation. SQLite makes a copy of the
** object and uses it for page cache memory allocations.</dd>
**
** <dt>SQLITE_CONFIG_GETPCACHE</dt>
** <dd>This option takes a single argument which is a pointer to an
** [sqlite3_pcache_methods] object. SQLite copies of the current
** page cache implementation into that object.</dd>
**
** </dl>
*/

```

Found in path(s):

```

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/src/sqlite.h.in
No license file was found, but licenses were detected in source scan.

```

Sources are in the public domain.

Rather than using fopen() to write XML or some proprietary format into

Found in path(s):

```

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/features.html
No license file was found, but licenses were detected in source scan.

```

SQLite is in the public domain. This document describes what that means

Found in path(s):

```

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite_docs_3_6_20.zip-cosi-expand-archive-MNhBWwk2/sqlite-3_6_20-docs/docs.html
No license file was found, but licenses were detected in source scan.

```

/*

- * This code implements the MD5 message-digest algorithm.
- * The algorithm is due to Ron Rivest. This code was
- * written by Colin Plumb in 1993, no copyright is claimed.
- * This code is in the public domain; do with it what you wish.

```

*
* Equivalent code is available from RSA Data Security, Inc.
* This code has been tested against that, and is equivalent,
* except that you don't need to include two pages of legalese
* with every copy.
*
* To compute the message digest of a chunk of bytes, declare an
* MD5Context structure, pass it to MD5Init, call MD5Update as
* needed on buffers full of bytes, and then call MD5Final, which
* will fill a supplied 16-byte array with the digest.
*/

```

Found in path(s):

```

* /opt/cola/permits/1710121454_1686274631.697395/0/sqlite-3.6.20-1.el6-1.src.rpm-cosi-expand-archive-
MhwfXaVq/sqlite-3.6.20.tar.gz-cosi-expand-archive-aSRXUdvA/sqlite-3.6.20/src/tclsqlite.c

```

1.122 inetutils 1.5

1.122.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

This version of the GNU Lesser General Public License incorporates the terms and conditions of version 3 of the GNU General Public License, supplemented by the additional permissions listed below.

0. Additional Definitions.

As used herein, "this License" refers to version 3 of the GNU Lesser General Public License, and the "GNU GPL" refers to version 3 of the GNU General Public License.

"The Library" refers to a covered work governed by this License, other than an Application or a Combined Work as defined below.

An "Application" is any work that makes use of an interface provided by the Library, but which is not otherwise based on the Library. Defining a subclass of a class defined by the Library is deemed a mode of using an interface provided by the Library.

A "Combined Work" is a work produced by combining or linking an

Application with the Library. The particular version of the Library with which the Combined Work was made is also called the "Linked Version".

The "Minimal Corresponding Source" for a Combined Work means the Corresponding Source for the Combined Work, excluding any source code for portions of the Combined Work that, considered in isolation, are based on the Application, and not on the Linked Version.

The "Corresponding Application Code" for a Combined Work means the object code and/or source code for the Application, including any data and utility programs needed for reproducing the Combined Work from the Application, but excluding the System Libraries of the Combined Work.

1. Exception to Section 3 of the GNU GPL.

You may convey a covered work under sections 3 and 4 of this License without being bound by section 3 of the GNU GPL.

2. Conveying Modified Versions.

If you modify a copy of the Library, and, in your modifications, a facility refers to a function or data to be supplied by an Application that uses the facility (other than as an argument passed when the facility is invoked), then you may convey a copy of the modified version:

- a) under this License, provided that you make a good faith effort to ensure that, in the event an Application does not supply the function or data, the facility still operates, and performs whatever part of its purpose remains meaningful, or
- b) under the GNU GPL, with none of the additional permissions of this License applicable to that copy.

3. Object Code Incorporating Material from Library Header Files.

The object code form of an Application may incorporate material from a header file that is part of the Library. You may convey such object code under terms of your choice, provided that, if the incorporated material is not limited to numerical parameters, data structure layouts and accessors, or small macros, inline functions and templates (ten or fewer lines in length), you do both of the following:

- a) Give prominent notice with each copy of the object code that the Library is used in it and that the Library and its use are

covered by this License.

b) Accompany the object code with a copy of the GNU GPL and this license document.

4. Combined Works.

You may convey a Combined Work under terms of your choice that, taken together, effectively do not restrict modification of the portions of the Library contained in the Combined Work and reverse engineering for debugging such modifications, if you also do each of the following:

a) Give prominent notice with each copy of the Combined Work that the Library is used in it and that the Library and its use are covered by this License.

b) Accompany the Combined Work with a copy of the GNU GPL and this license document.

c) For a Combined Work that displays copyright notices during execution, include the copyright notice for the Library among these notices, as well as a reference directing the user to the copies of the GNU GPL and this license document.

d) Do one of the following:

0) Convey the Minimal Corresponding Source under the terms of this License, and the Corresponding Application Code in a form suitable for, and under terms that permit, the user to recombine or relink the Application with a modified version of the Linked Version to produce a modified Combined Work, in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.

1) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (a) uses at run time a copy of the Library already present on the user's computer system, and (b) will operate properly with a modified version of the Library that is interface-compatible with the Linked Version.

e) Provide Installation Information, but only if you would otherwise be required to provide such information under section 6 of the GNU GPL, and only to the extent that such information is necessary to install and execute a modified version of the

Combined Work produced by recombining or relinking the Application with a modified version of the Linked Version. (If you use option 4d0, the Installation Information must accompany the Minimal Corresponding Source and Corresponding Application Code. If you use option 4d1, you must provide the Installation Information in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.)

5. Combined Libraries.

You may place library facilities that are a work based on the Library side by side in a single library together with other library facilities that are not Applications and are not covered by this License, and convey such a combined library under terms of your choice, if you do both of the following:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities, conveyed under the terms of this License.
- b) Give prominent notice with the combined library that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

6. Revised Versions of the GNU Lesser General Public License.

The Free Software Foundation may publish revised and/or new versions of the GNU Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library as you received it specifies that a certain numbered version of the GNU Lesser General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that published version or of any later version published by the Free Software Foundation. If the Library as you received it does not specify a version number of the GNU Lesser General Public License, you may choose any version of the GNU Lesser General Public License ever published by the Free Software Foundation.

If the Library as you received it specifies that a proxy can decide whether future versions of the GNU Lesser General Public License shall apply, that proxy's public statement of acceptance of any version is permanent authorization for you to choose that version for the Library.

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for
software and other kinds of works.

The licenses for most software and other practical works are designed
to take away your freedom to share and change the works. By contrast,
the GNU General Public License is intended to guarantee your freedom to
share and change all versions of a program--to make sure it remains free
software for all its users. We, the Free Software Foundation, use the
GNU General Public License for most of our software; it applies also to
any other work released this way by its authors. You can apply it to
your programs, too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses
are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
them if you wish), that you receive source code or can get it if you
want it, that you can change the software or use pieces of it in new
free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you
these rights or asking you to surrender the rights. Therefore, you have
certain responsibilities if you distribute copies of the software, or if
you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether
gratis or for a fee, you must pass on to the recipients the same
freedoms that you received. You must make sure that they, too, receive
or can get the source code. And you must show them these terms so they
know their rights.

Developers that use the GNU GPL protect your rights with two steps:
(1) assert copyright on the software, and (2) offer
you this License
giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains
that there is no warranty for this free software. For both users' and
authors' sake, the GPL requires that modified versions be marked as

changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without

permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than

the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free

programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or

similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated

place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the

User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections

15 and 16 of this License; or

- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under

this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever

licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not

impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other

readily accessible means,
then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you

to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY

OF ANY KIND, EITHER EXPRESSED OR IMPLIED,
INCLUDING, BUT NOT LIMITED TO,
THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR
PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM
IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF
ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING
WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS
THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY
GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE
USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF
DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD
PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS),
EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF
SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer
of warranty and limitation of liability provided
above cannot be given local legal effect according to their terms,
reviewing courts shall apply local law that most closely approximates
an absolute waiver of all civil liability in connection with the
Program, unless a warranty or assumption of liability accompanies a
copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest
possible use to the public, the best way to achieve this is to make it
free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest
to attach them to the start of each source file to most effectively
state the exclusion of warranty; and each file should have at least
the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea
of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by

the Free Software Foundation, either version 3 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short
notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY  
NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate
parts of the General Public License. Of course, your program's commands
might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school,
if any, to sign a "copyright disclaimer" for the program, if necessary.
For more information on this, and how to apply and follow the GNU GPL, see
<http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program
into proprietary programs. If your program is a subroutine library, you
may consider it more useful to permit linking proprietary applications with
the library. If this is what you want to do, use the GNU Lesser General
Public License instead of this License. But first,
please read
<http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.123 lvm2 1.02.74

1.123.1 Available under license :

This package was debianized by Andres Salomon <dilinger@mp3revolution.net> on
Wed, 20 Feb 2002 03:17:25 -0500.

It was downloaded from http://www.sistina.com/products_lvm.htm

Upstream Author: LVM Development Team

Copyright (c) 2001-2002 LVM Development Team

LVM2 is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

LVM2 is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

On Debian systems, the full text of the GPL can be found in /usr/share/common-licenses/GPL

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for

this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is

analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under

copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses

the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally

distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the

original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new

versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so

that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1

above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by

modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each

time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED

TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN
IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program ``Gnomovision'` (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.124 libnsI 2.12

1.124.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who

decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser

General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order

to run.

GNU LESSER GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy,

and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application

to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any

other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision

will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey

the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or

modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.125 nfs-utils 1.2.3

1.125.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to

using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program

or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide

a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program

in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies

a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

rpc.statd -- Network Status Monitor (NSM) protocol daemon for Linux.
Copyright (C) 1995-1999, 2002, 2005 Jeffrey A. Uphoff

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Massachusetts Ave, Cambridge, MA 02139, USA.

Jeffrey A. Uphoff
Orion Multisystems, Inc.
3090 Oakmead Village Drive
Santa Clara, CA 95051
USA

Phone: +1-408-844-8481
Internet: juphoff@users.sourceforge.net

1.126 libpng 1.2.44

1.126.1 Available under license :

Copyright (c) 1998-2008 Greg Roelofs. All rights reserved.

This software is provided "as is," without warranty of any kind, express or implied. In no event shall the author or contributors be held liable for any damages arising in any way from the use of this software.

The contents of this file are DUAL-LICENSED. You may modify and/or redistribute this software according to the terms of one of the following two licenses (at your option):

LICENSE 1 ("BSD-like with advertising clause"):

Permission is granted to anyone to use this software for any purpose, including commercial applications, and to alter it and redistribute it freely, subject to the following restrictions:

1. Redistributions of source code must retain the above copyright notice, disclaimer, and this list of conditions.
2. Redistributions in binary form must reproduce the above copyright notice, disclaimer, and this list of conditions in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgment:

This product includes software developed by Greg Roelofs and contributors for the book, "PNG: The Definitive Guide," published by O'Reilly and Associates.

LICENSE 2 (GNU GPL v2 or later):

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

pnm2png / png2pnm --- conversion from PBM/PGM/PPM-file to PNG-file

copyright (C) 1999-2019 by Willem van Schaik <willem at schaik dot com>

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights

to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

The software is provided "as is", without warranty of any kind, express or implied, including but not limited to the warranties of merchantability, fitness for a particular purpose and noninfringement. In no event shall the authors or copyright holders be liable for any claim, damages or other liability,

whether in an action of contract, tort or otherwise, arising from, out of or in connection with the software or the use or other dealings in the software.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price.

Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest

your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source

code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any

such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the  
GNU General Public License as published by  
the Free Software Foundation; either version 2 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software

Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute
it
under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

COPYRIGHT NOTICE, DISCLAIMER, and LICENSE

=====

PNG Reference Library License version 2

- * Copyright (c) 1995-2019 The PNG Reference Library Authors.
- * Copyright (c) 2018-2019 Cosmin Truta.
- * Copyright (c) 2000-2002, 2004, 2006-2018 Glenn Randers-Pehrson.
- * Copyright (c) 1996-1997 Andreas Dilger.
- * Copyright (c) 1995-1996 Guy Eric Schalnat, Group 42, Inc.

The software is supplied "as is", without warranty of any kind,

express or implied, including, without limitation, the warranties of merchantability, fitness for a particular purpose, title, and non-infringement. In no event shall the Copyright owners, or anyone distributing the software, be liable for any damages or other liability, whether in contract, tort or otherwise, arising from, out of, or in connection with the software, or the use or other dealings in the software, even if advised of the possibility of such damage.

Permission is hereby granted
to use, copy, modify, and distribute
this software, or portions hereof, for any purpose, without fee,
subject to the following restrictions:

1. The origin of this software must not be misrepresented; you must not claim that you wrote the original software. If you use this software in a product, an acknowledgment in the product documentation would be appreciated, but is not required.
2. Altered source versions must be plainly marked as such, and must not be misrepresented as being the original software.
3. This Copyright notice may not be removed or altered from any source or altered source distribution.

PNG Reference Library License version 1 (for libpng 0.5 through 1.6.35)

libpng versions 1.0.7, July 1, 2000, through 1.6.35, July 15, 2018 are
Copyright (c) 2000-2002, 2004, 2006-2018 Glenn Randers-Pehrson, are
derived from libpng-1.0.6, and are distributed according to the same
disclaimer
and license as libpng-1.0.6 with the following individuals
added to the list of Contributing Authors:

Simon-Pierre Cadieux
Eric S. Raymond
Mans Rullgard
Cosmin Truta
Gilles Vollant
James Yu
Mandar Sahastrabudhe
Google Inc.
Vadim Barkov

and with the following additions to the disclaimer:

There is no warranty against interference with your enjoyment of the library or against infringement. There is no warranty that our efforts or the library will fulfill any of your particular purposes or needs. This library is provided with all faults, and the entire risk of satisfactory quality, performance, accuracy, and effort is with the user.

Some files in the "contrib" directory and some configure-generated files that are distributed with libpng have other copyright owners, and are released under other open source licenses.

libpng versions 0.97, January 1998, through 1.0.6, March 20, 2000, are Copyright (c) 1998-2000 Glenn Randers-Pehrson, are derived from libpng-0.96, and are distributed according to the same disclaimer and license as libpng-0.96, with the following individuals added to the list of Contributing Authors:

Tom Lane
Glenn Randers-Pehrson
Willem van Schaik

libpng versions 0.89, June 1996, through 0.96, May 1997, are Copyright (c) 1996-1997 Andreas Dilger, are derived from libpng-0.88, and are distributed according to the same disclaimer and license as libpng-0.88, with the following individuals added to the list of Contributing Authors:

John Bowler
Kevin Bracey
Sam Bushell
Magnus Holmgren
Greg Roelofs
Tom Tanner

Some files in the "scripts" directory have other copyright owners, but are released under this license.

libpng versions 0.5, May 1995, through 0.88, January 1996, are Copyright (c) 1995-1996 Guy Eric Schalnat, Group 42, Inc.

For the purposes of this copyright and license, "Contributing Authors" is defined as the following set of individuals:

Andreas Dilger
Dave Martindale
Guy Eric Schalnat
Paul Schmidt

Tim Wegner

The PNG Reference Library is supplied "AS IS". The Contributing Authors and Group 42, Inc. disclaim all warranties, expressed or implied, including, without limitation, the warranties of merchantability and of fitness for any purpose. The Contributing Authors and Group 42, Inc. assume no liability for direct, indirect, incidental, special, exemplary, or consequential damages, which may result from the use of the PNG Reference Library, even if advised of the possibility of such damage.

Permission is hereby granted to use, copy, modify, and distribute this source code, or portions hereof, for any purpose, without fee, subject to the following restrictions:

1. The origin of this source code must not be misrepresented.
2. Altered versions must be plainly marked as such and must not be misrepresented as being the original source.
3. This Copyright notice may not be removed or altered from any source or altered source distribution.

The Contributing Authors and Group 42, Inc. specifically permit, without fee, and encourage the use of this source code as a component to supporting the PNG file format in commercial products. If you use this source code in a product, acknowledgment is not required but would be appreciated.

1.127 hostapd 2.10

1.127.1 Available under license :

wpa_supplicant and hostapd

Copyright (c) 2002-2016, Jouni Malinen <j@w1.fi> and contributors
All Rights Reserved.

See the README file for the current license terms.

This software was previously distributed under BSD/GPL v2 dual license terms that allowed either of those license alternatives to be selected. As of February 11, 2012, the project has chosen to use only the BSD license option for future distribution. As such, the GPL v2 license option is no longer used. It should be noted that the BSD

license option (the one with advertisement clause removed) is compatible with GPL and as such, does not prevent use of this software in projects that use GPL.

Some of the files may still include pointers to GPL version 2 license terms. However, such copyright and license notifications are maintained only for attribution purposes and any distribution of this software after February 11, 2012 is no longer under the GPL v2 option.

1.128 iputils 20071127

1.128.1 Available under license :

No license file was found, but licenses were detected in source scan.

```
/* Mode: C;
* ifenslave.c: Configure network interfaces for parallel routing.
*
* This program controls the Linux implementation of running multiple
* network interfaces in parallel.
*
* Author: Donald Becker <becker@cesdis.gsfc.nasa.gov>
* Copyright 1994-1996 Donald Becker
*
* This program is free software; you can redistribute it
* and/or modify it under the terms of the GNU General Public
* License as published by the Free Software Foundation.
*
* The author may be reached as becker@CESDIS.gsfc.nasa.gov, or C/O
* Center of Excellence in Space Data and Information Sciences
* Code 930.5, Goddard Space Flight Center, Greenbelt MD 20771
*
* Changes :
* - 2000/10/02 Willy Tarreau <willy at meta-x.org> :
* - few fixes. Master's MAC address is now correctly taken from
* the first device when not previously set ;
* - detach support : call BOND_RELEASE to detach an enslaved
interface.
* - give a mini-howto from command-line help : # ifenslave -h
*
* - 2001/02/16 Chad N. Tindel <ctindel at ieee dot org> :
* - Master is now brought down before setting the MAC address. In
* the 2.4 kernel you can't change the MAC address while the device is
* up because you get EBUSY.
*
* - 2001/09/13 Takao Indoh <indou dot takao at jp dot fujitsu dot com>
* - Added the ability to change the active interface on a mode 1 bond
* at runtime.
```

- *
 - 2001/10/23 Chad N. Tindel <ctindel at ieee dot org> :
 - No longer set the MAC address of the master. The bond device will take care of this itself
 - Try the SIOC*** versions of the bonding ioctls before using the old versions
- * - 2002/02/18 Erik Habbinga <erik_habbinga @ hp dot com> :
 - ifr2.ifr_flags was not initialized in the hwaddr_notset case, SIOCGIFFLAGS now called before hwaddr_notset test
- *
 - 2002/10/31 Tony Cureington <tony.cureington * hp_com> :
 - If the master does not have a hardware address when the first slave is enslaved, the master is assigned the hardware address of that slave - there is a comment in bonding.c stating "ifenslave takes care of this now." This corrects the problem of slaves having different hardware addresses in active-backup mode when multiple interfaces are specified on a single ifenslave command (ifenslave bond0 eth0 eth1).
 - 2003/03/18 - Tsippy Mendelson <tsippy.mendelson at intel dot com> and Shmulik Hen <shmulik.hen at intel dot com>
 - Moved setting the slave's mac address and opening it, from the application to the driver. This enables support of modes that need to use the unique mac address of each slave. The driver also takes care of closing the slave and restoring its original mac address upon release.
 - In addition, block possibility of enslaving before the master is up. This prevents putting the system in an undefined state.
 - 2003/05/01 - Amir Noam <amir.noam at intel dot com>
 - Added ABI version control to restore compatibility between new/old ifenslave and new/old bonding.
 - Prevent adding an adapter that is already a slave. Fixes the problem of stalling the transmission and leaving the slave in a down state.
 - 2003/05/01 - Shmulik Hen <shmulik.hen at intel dot com>
 - Prevent enslaving if the bond device is down. Fixes the problem of leaving the system in unstable state and halting when trying to remove the module.
 - Close socket on all abnormal exists.
 - Add versioning scheme that follows that of the bonding driver. current version is 1.0.0 as a base line.
 - 2003/05/22 - Jay Vosburgh <fubar at us dot

ibm dot com>

- * - ifenslave -c was broken; it's now fixed
- * - Fixed problem with routes vanishing from master during enslave processing.
- *
- * - 2003/05/27 - Amir Noam <amir.noam at intel dot com>
- * - Fix backward compatibility issues:
 - * For drivers not using ABI versions, slave was set down while it should be left up before enslaving.
 - * Also, master was not set down and the default set_mac_address() would fail and generate an error message in the system log.
- * - For opt_c: slave should not be set to the master's setting while it is running. It was already set during enslave. To simplify things, it is now handled separately.
- *
- * - 2003/12/01 - Shmulik Hen <shmulik.hen at intel dot com>
- * - Code cleanup and style changes
- * set version to 1.1.0
- */

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmUq1F3/ifenslave.tar.gz-cosi-expand-archive-IFO5NfhD/ifenslave.c

No license file was found, but licenses were detected in source scan.

License: BSD

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmUq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/iputils.spec

No license file was found, but licenses were detected in source scan.

This documentation is free software; you can redistribute it and/or modify it under the terms of the GNU General Public warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

See the GNU General Public License for more details.

For more details see the file COPYING in the source

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmUq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/pg3.shtml

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmUq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/clockdiff.shtml

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmUq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/traceroute6.shtml

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmUq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/rarpd.shtml

*

/opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/arping.sgml
* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/tracepath.sgml
No license file was found, but licenses were detected in source scan.

```
/*  
* tracepath6.c  
*  
* This program is free software; you can redistribute it and/or  
* modify it under the terms of the GNU General Public License  
* as published by the Free Software Foundation; either version  
* 2 of the License, or (at your option) any later version.  
*  
* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>  
*/
```

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/tracepath6.c
No license file was found, but licenses were detected in source scan.

for more details.

This documentation is free software; you can redistribute it and/or modify it under the terms of the GNU General Public warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details. For more details see the file COPYING in the source

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/tftpd.sgml
No license file was found, but licenses were detected in source scan.

=head1 NAME

docbook2man-spec - convert DocBook RefEntries to Unix manpages

=head1 SYNOPSIS

The SGMLSpM package from CPAN. This contains the sgmlspl script which is used to grok this file. Use it like this:

```
nsgmls some-docbook-document.sgml | sgmlspl docbook2man-spec.pl
```

=head1 DESCRIPTION

This is a sgmlspl spec file that produces Unix-style

manpages from RefEntry markup.

See the accompanying RefEntry man page for 'plain new' documentation. :)

=head1 LIMITATIONS

Trying docbook2man on non-DocBook or non-conformant SGML results in undefined behavior. :-)

This program is a slow, dodgy Perl script.

This program does not come close to supporting all the possible markup in DocBook, and will produce wrong output in some cases with supported markup.

=head1 TODO

Add new element handling and fix existing handling. Be robust. Produce cleanest, readable man output as possible (unlike some other converters). Follow Linux man(7) convention. If this results in added logic in this script, that's okay. The code should still be reasonably organized.

Make it faster. If Perl sucks port it to another language.

=head1 COPYRIGHT

Copyright (C) 1998-1999 Steve Cheng <steve@ggi-project.org>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version.

You should have received a copy of the GNU General Public License along with this program; see the file COPYING. If not, please write to the Free Software Foundation, 675 Mass Ave, Cambridge, MA 02139, USA.

=cut

\$Id: docbook2man-spec.pl,v 1.1 2000/07/21 20:22:30 rosalia Exp \$

use SGMLS; # Use the SGMLS package.
use SGMLS::Output; # Use stack-based output.
use SGMLS::Refs;

#####

```

# SGMLSPL script produced automatically by
# the script sgmlspl.pl
#
# Document Type: any, but processes only RefEntries
# Edited by: me :)
#####

$write_manpages = 0;
$blank_xrefs = 0;

sgml('start', sub {
  push_output('nul');
  $raw_cdata = 1; # Makes it a bit faster.

  # Links file
  open(LINKSFILE, ">manpage.links");

  $Refs = new SGMLS::Refs("manpage.refs");
});
sgml('end', sub {
  close(LINKSFILE);
  if($blank_xrefs) {
    print STDERR "Warning: output contains unresolved XRefs\n";
  }
});

#####
#
# Output helpers
#
#####

# Our own version of sgml() and output() to allow simple string output
# to play well with roff's stupid whitespace rules.

sub man_sgml
{
  if(ref($_[1]) eq 'CODE') {
    return &sgml;
  }

  my $s = $_[1];

  $s =~ s/\\|\\\|\\g;
  $s =~ s/'^|'|g;

```



```

# \n at the beginning means start at beginning of line
if($s
 =~ s/^\n/) {
  $sub = 'sub { output "\n" unless $newline_last++; };
  if($s eq ") {
    sgml($_[0], eval('sub { output "\n" unless $newline_last++; }'));
  } elsif($s =~ /\n$/) {
    sgml($_[0], eval("sub { output '\\\n\' unless \\'$newline_last++; output '$s'; }"));
  } else {
    sgml($_[0], eval("sub { output '\\\n\' unless \\'$newline_last; output '$s'; \\'$newline_last = 0; }"));
  }
} else {
  if($s =~ /\n$/) {
    sgml($_[0], eval("sub { output '$s'; \\'$newline_last = 1; }"));
  } else {
    sgml($_[0], eval("sub { output '$s'; \\'$newline_last = 0; }"));
  }
}
}

```

```

sub man_output

```

```

{
  $_ = shift;
  if(s/^\n/) {
    output "\n" unless $newline_last++;
  }
  return if $_ eq ";

```

```

output $_;

```

```

if(@_) {
  output @_;
  $newline_last = (pop(@_) =~ /\n$/);
} else {
  $newline_last = ($_ =~ /\n$/)
}
}

```

```

# Fold lines into one, quote some characters

```

```

sub fold_string

```

```

{
  $_ = shift;

  s/\\|\\|\\|/g;
  s/'/\\|&"/g;

```

```

# Change tabs to spaces

```

```

tr/\t\n/ /;

# Trim whitespace from beginning and end.
s/^ +//;
s/
+$///;

return $_;
}

sub save_cdata()
{
$raw_cdata++;
push_output('string');
}

sub bold_on()
{
# If the last font is also bold, don't change anything.
# Basically this is to just get more readable man output.
if($fontstack[$#fontstack] ne 'bold') {
if(!$raw_cdata) {
output '\fB';
$newline_last = 0;
}
}
push(@fontstack, 'bold');
}

sub italic_on()
{
# If the last font is also italic, don't change anything.
if($fontstack[$#fontstack] ne 'italic') {
if(!$raw_cdata) {
output '\fI';
$newline_last = 0;
}
}
push(@fontstack, 'italic');
}

sub font_off()
{
my $thisfont = pop(@fontstack);
my $lastfont = $fontstack[$#fontstack];

# Only output font change if it is different
if($thisfont ne $lastfont) {

```

```
if($raw_cdata) { return; }
elseif($lastfont eq 'bold') { output '\fB'; }
elseif($lastfont eq 'italic') { output '\fI'; }
else { output '\fR'; }
```

```
$newline_last = 0;
}
}
```

```
#####
```

```
#
#
```

```
Manpage management
```

```
#
```

```
#####
```

```
sgml('<REFENTRY>', sub {
# This will be overwritten at end of REFMETA, when we know the name of the page.
pop_output();
```

```
$write_manpages = 1; # Currently writing manpage.
```

```
$nocollapse_whitespace = 0; # Current whitespace collapse counter.
```

```
$newline_last = 1; # At beginning of line?
```

```
# Just a bit of warning, you will see this variable manipulated
# manually a lot. It makes the code harder to follow but it
# saves you from having to worry about collapsing at the end of
# parse, stopping at verbatims, etc.
```

```
$raw_cdata = 0; # Instructs certain output functions to
# leave CDATA alone, so we can assign
# it to a string and process it, etc.
```

```
@fontstack = (); # Fonts being activated.
```

```
$manpage_title = ""; # Needed for indexing.
```

```
$manpage_sect = "";
```

```
@manpage_names = ();
```

```
$manpage_misc = "";
```

```
$list_nestlevel = 0; # Indent certain nested
content.
```

```
});
sgml('</REFENTRY>', sub {
```

```

if(!$newline_last) {
    output "\n";
}

$write_manpages = 0;
$raw_cdata = 1;
push_output('nul');
});

sgml('</REFMETA>', sub {
    push_output('file', "$manpage_title.$manpage_sect");

    output <<_END_BANNER;
    .\\ " This manpage has been automatically generated by docbook2man
    .\\ " from a DocBook document. This tool can be found at:
    .\\ " <http://shell.ipoline.com/~elmert/comp/docbook2X/>
    .\\ " Please send any bug reports, improvements, comments, patches,
    .\\ " etc. to Steve Cheng <steve\@ggi-project.org>.
    _END_BANNER

    my $manpage_date = `date "+%d %B %Y"`;

    output '.TH "'';

    # If the title is not mixed-case, convention says to
    # uppercase the whole title. (The canonical title is
    # lowercase.)
    if($manpage_title =~ /[A-Z]/) {
        output fold_string($manpage_title);
    } else {
        output uc(fold_string($manpage_title));
    }

    output "' '", fold_string($manpage_sect),
    "' '", fold_string(`date "+%d %B %Y"`),
    "' '", $manpage_misc,
    "' '",
    $manpage_manual,
    "\\n";

    $newline_last = 1;

    # References to this RefEntry.
    my $id = $_[0]->parent->attribute('ID')->value;
    if($id ne "") {
        # The 'package name' part of the section should
        # not be used when citing it.
        my ($sectnum) = ($manpage_sect =~ /([0-9]*)/);

```

```

if($_[0]->parent->attribute('XREFLABEL')->value eq ") {
  $Refs->put("refentry:$id", "$manpage_title($sectnum)");
} else {
  $Refs->put("refentry:$id",
    $_[0]->parent->attribute('XREFLABEL')->value .
    "($sectnum)");
}
}
});

```

```

sgml('<REFENTRYTITLE>', sub {
  if($_[0]->in('REFMETA')) {
    save_cdata();
  } else {
    # Manpage citations are in bold.
    bold_on();
  }
});

```

```

sgml('</REFENTRYTITLE>', sub {
  if($_[0]->in('REFMETA')) {
    $raw_cdata--;
    $manpage_title = pop_output();
  }
  else { font_off(); }
});

```

```

sgml('<MANVOLNUM>', sub {
  if($_[0]->in('REFMETA')) {
    save_cdata();
  } else {
    # Manpage citations use ().
    output '(';
  }
});

```

```

sgml('</MANVOLNUM>', sub {
  if($_[0]->in('REFMETA')) {
    $raw_cdata--;
    $manpage_sect
    = pop_output();
  }
  else { output ')' }
});

```

```

sgml('<REFMISCINFO>', \&save_cdata);
sgml('</REFMISCINFO>', sub {
  $raw_cdata--;
  $manpage_misc = fold_string(pop_output());

```

```

});

# NAME section
man_sgml('<REFNAMEDIV>', "\n.SH NAME\n");

sgml('<REFNAME>', \&save_cdata);
sgml('</REFNAME>', sub {
    $raw_cdata--;
    push(@manpage_names, pop_output());
});

sgml('<REFPURPOSE>', \&save_cdata);
sgml('</REFPURPOSE>', sub {
    $raw_cdata--;
    my $manpage_purpose = fold_string(pop_output());

    for(my $i = 0; $i < $#manpage_names; $i++) {
        output fold_string($manpage_names[$i], ', ');
    }

    output fold_string($manpage_names[$#manpage_names]);
    output " \|- $manpage_purpose\n";

    $newline_last = 1;

    foreach(@manpage_names) {
        # Don't link to itself
        if($_ ne $manpage_title) {
            print LINKSFILE "$manpage_title.$manpage_sect $_.$manpage_sect\n";
        }
    }
});

man_sgml('<REFCLASS>', "\n.sp\n");

#RefDescriptor

#####
#
#
SYNOPSIS section and synopses
#
#####

```

```

man_sgml('<REFSYNOPSISDIV>', "\n.SH SYNOPSIS\n");
man_sgml('</REFSYNOPSISDIV>', "\n");

## FIXME! Must be made into block elements!!
#sgml('<FUNCSYNOPSIS>', \&bold_on);
#sgml('</FUNCSYNOPSIS>', \&font_off);
#sgml('<CMDSYNOPSIS>', \&bold_on);
#sgml('</CMDSYNOPSIS>', \&font_off);

man_sgml('<FUNCSYNOPSIS>', sub {
    man_output("\n.sp\n");
    bold_on();
});
man_sgml('</FUNCSYNOPSIS>', sub {
    font_off();
    man_output("\n");
});

man_sgml('<CMDSYNOPSIS>', "\n\n");
man_sgml('</CMDSYNOPSIS>', "\n\n");

man_sgml('<FUNCPROTOTYPE>', "\n.sp\n");

# Arguments to functions. This is C convention.
man_sgml('<PARAMDEF>', '(');
man_sgml('</PARAMDEF>', ');');
man_sgml('<VOID>', "(void);");

sub arg_start
{
    # my $choice = $_[0]->attribute('CHOICE')->value;

    # The content model for CmdSynopsis doesn't include #PCDATA,
    # so we won't see any of the whitespace in the source file,
    #
    # so we have to add it after each component.
    output ' ';

    if($_[0]->attribute('CHOICE')->value =~ /opt/i) {
        output '[';
    }
    bold_on();
}
sub arg_end
{

```

```

font_off();
if($_[0]->attribute('REP')->value =~ /^Repeat/i) {
    italic_on();
    output ' ...';
    font_off();
}
if($_[0]->attribute('CHOICE')->value =~ /opt/i) {
    output ']';
}
}

sgml('<ARG>', \&arg_start);
sgml('</ARG>', \&arg_end);
sgml('<GROUP>', \&arg_start);
sgml('</GROUP>', \&arg_end);

sgml('<OPTION>', \&bold_on);
sgml('</OPTION>', \&font_off);

# FIXME: This is one _blank_ line.
man_sgml('<SBR>', "\n\n");

#####
#
# General sections
#
#####

# The name of the section is handled by TITLE. This just sets
# up the roff markup.
man_sgml('<REFSECT1>', "\n.SH ");
man_sgml('<REFSECT2>', "\n.SS ");
man_sgml('<REFSECT3>', "\n.SS ");

#####
#
#
# Titles, metadata.
#
#####

sgml('<TITLE>', sub {
    if($_[0]->in('REFERENCE') or $_[0]->in('BOOK')) {
        $write_manpages = 1;
    }
}
save_cdata();

```



```

});
sgml('</TITLE>', sub {
  my $title = fold_string(pop_output());
  $raw_cdata--;

  if($_[0]->in('REFERENCE') or $_[0]->in('BOOK')) {
    # We use TITLE of enclosing Reference or Book as manual name
    $manpage_manual = $title;
    $write_manpages = 0;
  }
  elsif(exists $_[0]->parent->ext->{'title'}) {
    # By far the easiest case. Just fold the string as
    # above, and then set the parent element's variable.
    $_[0]->parent->ext->{'title'} = $title;
  }
  else {
    # If the parent element's handlers are lazy,
    # output the folded string for them :)
    # We assume they want uppercase and a newline.
    output "", uc($title), "\\n";
    $newline_last = 1;
  }
});

sgml('<ATTRIBUTE>', sub { push_output('string') });
sgml('</ATTRIBUTE>', sub { $_[0]->parent->ext->{'attribution'}
  = pop_output(); });

# IGNORE.
sgml('<DOCINFO>', sub { push_output('nul'); });
sgml('</DOCINFO>', sub { pop_output(); });
sgml('<REFSECT1INFO>', sub { push_output('nul'); });
sgml('</REFSECT1INFO>', sub { pop_output(); });
sgml('<REFSECT2INFO>', sub { push_output('nul'); });
sgml('</REFSECT2INFO>', sub { pop_output(); });
sgml('<REFSECT3INFO>', sub { push_output('nul'); });
sgml('</REFSECT3INFO>', sub { pop_output(); });

sgml('<INDEXTERM>', sub { push_output('nul'); });
sgml('</INDEXTERM>', sub { pop_output(); });

#####
#
# Set bold on enclosed content
#
#####

```

```

sgml('<APPLICATION>', \&bold_on); sgml('</APPLICATION>', \&font_off);

sgml('<CLASSNAME>', \&bold_on); sgml('</CLASSNAME>', \&font_off);
sgml('<STRUCTNAME>', \&bold_on); sgml('</STRUCTNAME>', \&font_off);
sgml('<STRUCTFIELD>', \&bold_on); sgml('</STRUCTFIELD>', \&font_off);
sgml('<SYMBOL>',
\&bold_on); sgml('</SYMBOL>', \&font_off);
sgml('<TYPE>', \&bold_on); sgml('</TYPE>', \&font_off);

sgml('<ENVAR>', \&bold_on); sgml('</ENVAR>', \&font_off);

sgml('<FUNCTION>', \&bold_on); sgml('</FUNCTION>', \&font_off);

sgml('<EMPHASIS>', \&bold_on); sgml('</EMPHASIS>', \&font_off);

sgml('<ERRORNAME>', \&bold_on); sgml('</ERRORNAME>', \&font_off);
# ERRORTYPE

sgml('<COMMAND>', \&bold_on); sgml('</COMMAND>', \&font_off);

sgml('<GUIBUTTON>', \&bold_on); sgml('</GUIBUTTON>', \&font_off);
sgml('<GUIICON>', \&bold_on); sgml('</GUIICON>', \&font_off);
# GUILABEL
# GUIMENU
# GUIMENUITEM
# GUISUBMENU
# MENUCHOICE
# MOUSEBUTTON

sgml('<ACCEL>', \&bold_on); sgml('</ACCEL>', \&font_off);
sgml('<KEYCAP>', \&bold_on); sgml('</KEYCAP>', \&font_off);
sgml('<KEYSYM>', \&bold_on); sgml('</KEYSYM>', \&font_off);
# KEYCODE
# KEYCOMBO
# SHORTCUT

sgml('<USERINPUT>', \&bold_on); sgml('</USERINPUT>', \&font_off);

sgml('<INTERFACEDEFINITION>', \&bold_on);
sgml('</INTERFACEDEFINITION>', \&font_off);

#
  May need to look at the CLASS
sgml('<SYSTEMITEM>', \&bold_on);
sgml('</SYSTEMITEM>', \&font_off);

```

```
#####  
#  
# Set italic on enclosed content  
#  
#####
```

```
sgml('<FIRSTTERM>', \&italic_on); sgml('</FIRSTTERM>', \&font_off);
```

```
sgml('<FILENAME>', \&italic_on); sgml('</FILENAME>', \&font_off);  
sgml('<PARAMETER>', \&italic_on); sgml('</PARAMETER>', \&font_off);  
sgml('<PROPERTY>', \&italic_on); sgml('</PROPERTY>', \&font_off);
```

```
sgml('<REPLACEABLE>', sub {  
  italic_on();  
  if($_->in('TOKEN')) {  
    # When tokenizing, follow more 'intuitive' convention  
    output "<";  
  }  
});  
sgml('</REPLACEABLE>', sub {  
  if($_->in('TOKEN')) {  
    output ">";  
  }  
  font_off();  
});
```

```
sgml('<CITETITLE>', \&italic_on); sgml('</CITETITLE>', \&font_off);  
sgml('<FOREIGNPHRASE>', \&italic_on); sgml('</FOREIGNPHRASE>', \&font_off);
```

```
sgml('<LINEANNOTATION>', \&italic_on); sgml('</LINEANNOTATION>',  
\&font_off);
```

```
#####  
#  
# Other 'inline' elements  
#  
#####
```

```
man_sgml('<EMAIL>', '<');  
man_sgml('</EMAIL>', '>');
```

```

man_sgml('<OPTIONAL>', '[');
man_sgml('</OPTIONAL>', ']');

man_sgml('</TRADEMARK>', "\\u\\s-2TM\\s+2\\d");

man_sgml('<COMMENT>', "[Comment: ");
man_sgml('</COMMENT>', ']");

man_sgml('<QUOTE>', "`");
man_sgml('</QUOTE>', "`");

#man_sgml('<LITERAL>', '"');
#man_sgml('</LITERAL>', '"');

# No special presentation:

# AUTHOR
# AUTHORINITIALS

# ABBREV
# ACTION
# ACRONYM
# ALT
# CITATION
# PHRASE
# QUOTE
# WORDASWORD

# COMPUTEROUTPUT
# MARKUP
# PROMPT
# RETURNVALUE
# SGMLTAG
# TOKEN

# DATABASE
# HARDWARE
# INTERFACE
# MEDIALABEL

# There doesn't seem to be a good way to represent LITERAL in -man

#####
#
# Paragraph and paragraph-like elements
#

```

```
#####
```

```
sub
para_start {
output "\n" unless $newline_last++;

# In lists, etc., don't start paragraph with .PP since
# the indentation will be gone.

if($_[0]->parent->ext->{'nbreak'}==1) {
# Usually this is the FIRST element of
# a hanging tag, so we MUST not do a full
# paragraph break.
$_[0]->parent->ext->{'nbreak'} = 2;
} elsif($_[0]->parent->ext->{'nbreak'}==2) {
# Usually these are the NEXT elements of
# a hanging tag. If we break using a blank
# line, we're okay.
output "\n";
} else {
# Normal case. (For indented blocks too, at least
# -man isn't so braindead in this area.)
output ".PP\n";
}
}
# Actually applies to a few other block elements as well
sub para_end {
output "\n" unless $newline_last++;
}
```

```
sgml('<PARA>', \&para_start);
sgml('</PARA>', \&para_end);
sgml('<SIMPARA>', \&para_start);
sgml('</SIMPARA>', \&para_end);
```

```
# Nothing special, except maybe FIXME set nbreak.
sgml('<INFORMALEXAMPLE>',
\&para_start);
sgml('</INFORMALEXAMPLE>', \&para_end);
```

```
#####
```

```
#
# Blocks using SS sections
#
```

#####

FIXME: We need to consider the effects of SS
in a hanging tag :(

Complete with the optional-title dilemma (again).

```
sgml('<ABSTRACT>', sub {  
  $_[0]->ext->{'title'} = 'ABSTRACT';  
  output "\n" unless $newline_last++;  
  push_output('string');  
});  
sgml('</ABSTRACT>', sub {  
  my $content = pop_output();
```

```
# As ABSTRACT is never on the same level as RefSect1,  
# this leaves us with only .SS in terms of -man macros.  
output ".SS \"", uc($_[0]->ext->{'title'}), "\"\n";
```

```
output $content;  
output "\n" unless $newline_last++;  
});
```

Ah, I needed a break. Example always has a title.

```
man_sgml('<EXAMPLE>', "\n.SS ");  
sgml('</EXAMPLE>', \&para_end);
```

Same with sidebar.

```
man_sgml('<SIDEBAR>', "\n.SS ");  
sgml('</SIDEBAR>', \&para_end);
```

NO title.

```
man_sgml('<HIGHLIGHTS>',  
  "\n.SS HIGHLIGHTS\n");  
sgml('</HIGHLIGHTS>', \&para_end);
```

#####

#

Indented 'Block' elements

#

#####

```
sub indent_block_start
```

```
{  
  output "\n" unless $newline_last++;  
  output ".sp\n.RS\n";
```

```

}
sub indent_block_end
{
output "\n" unless $newline_last++;
output ".RE\n";
}

# This element is almost like an admonition (below),
# only the default title is blank :)

sgml('<BLOCKQUOTE>', sub {
$_[0]->ext->{'title'} = "";
output "\n" unless $newline_last++;
push_output('string');
});
sgml('</BLOCKQUOTE>', sub {
my $content = pop_output();

indent_block_start();

if($_[0]->ext->{'title'}) {
output ".B \\"", $_[0]->ext->{'title'}, "\"\n";
}

output $content;

if($_[0]->ext->{'attribution'}) {
output "\n" unless $newline_last++;
# One place where roff's space-sensitivity makes sense :)
output "\n      -- ";
output
$_[0]->ext->{'attribution'} . "\n";
}

indent_block_end();
});

# Set off admonitions from the rest of the text by indenting.
# FIXME: Need to check if this works inside paragraphs, not enclosing them.
sub admonition_end {
my $content = pop_output();

indent_block_start();

# When the admonition is only one paragraph,
# it looks nicer if the title was inline.
my $num_para;
while ($content =~ /\^\.PP/gm) { $num_para++ }

```

```

if($num_para==1) {
  $content =~ s/^\.PP\n//;
}

output ".B \"\" . $_[0]->ext->{'title'} . ":\n";
output $content;

indent_block_end();
}

sgml('<NOTE>', sub {
  # We can't see right now whether or not there is a TITLE
  # element, so we have to save the output now and add it back
  # at the end of this admonition.
  $_[0]->ext->{'title'} = 'Note';

  # Although admonition_end's indent_block_start will do this,
  # we need to synchronize the output _now_
  output "\n" unless $newline_last++;

  push_output('string');
});
sgml('</NOTE>', \&admonition_end);

#
  Same as above.
sgml('<WARNING>', sub {
  $_[0]->ext->{'title'} = 'Warning';
  output "\n" unless $newline_last++;
  push_output('string');
});
sgml('</WARNING>', \&admonition_end);

sgml('<TIP>', sub {
  $_[0]->ext->{'title'} = 'Tip';
  output "\n" unless $newline_last++;
  push_output('string');
});
sgml('</TIP>', \&admonition_end);
sgml('<CAUTION>', sub {
  $_[0]->ext->{'title'} = 'Caution';
  output "\n" unless $newline_last++;
  push_output('string');
});
sgml('</CAUTION>', \&admonition_end);

sgml('<IMPORTANT>', sub {
  $_[0]->ext->{'title'} = 'Important';

```



```

output "\n" unless $newline_last++;
push_output('string');
});
sgml('</IMPORTANT>', \&admonition_end);

```

```

#####
#
# Verbatim displays.
#
#####

```

```

sub verbatim_start {
output "\n" unless $newline_last++;

if($_[0]->parent->ext->{'nobreak'}==1) {
# Usually this is the FIRST element of
#
a hanging tag, so we MUST not do a full
# paragraph break.
$_[0]->parent->ext->{'nobreak'} = 2;
} else {
output "\n";
}

output(".nf\n") unless $nocollapse_whitespace++;
}

```

```

sub verbatim_end {
output "\n" unless $newline_last++;
output(".fi\n") unless --$nocollapse_whitespace;
}

```

```

sgml('<PROGRAMLISTING>', \&verbatim_start);
sgml('</PROGRAMLISTING>', \&verbatim_end);

```

```

sgml('<SCREEN>', \&verbatim_start);
sgml('</SCREEN>', \&verbatim_end);

```

```

sgml('<LITERALLAYOUT>', \&verbatim_start);
sgml('</LITERALLAYOUT>', \&verbatim_end);

#sgml('<SYNOPSIS>', sub {
# if($_[0]->attribute('FORMAT')->value =~ /linespecific/i) {
# &verbatim_start;
# } else {
# roffcmd("");
# }
#});
#
#sgml('</SYNOPSIS>', sub {
# if($_[0]->attribute('FORMAT')->value =~ /linespecific/i) {
# &verbatim_end;
# }
# else {
# roffcmd("");# not sure about this.
# }
#});
sgml('<SYNOPSIS>', \&verbatim_start);
sgml('</SYNOPSIS>', \&verbatim_end);

```

```

#####
#
#
Lists
#
#####

```

```

# Indent nested lists.
sub indent_list_start {
if($list_nestlevel++) {
output "\n" unless $newline_last++;
output ".RS\n";
}
}
sub indent_list_end {
if(--$list_nestlevel) {
output "\n" unless $newline_last++;
}
}

```

```

output ".RE\n";
}
}

sgml('<VARIABLELIST>', \&indent_list_start);
sgml('</VARIABLELIST>', \&indent_list_end);
sgml('<ITEMIZEDLIST>', \&indent_list_start);
sgml('</ITEMIZEDLIST>', \&indent_list_end);
sgml('<ORDEREDLIST>', sub {
indent_list_start();
$_[0]->ext->{'count'} = 1;
});
sgml('</ORDEREDLIST>', \&indent_list_end);

# Output content on one line, bolded.
sgml('<TERM>', sub {
output "\n" unless $newline_last++;
output ".TP\n";
bold_on();
push_output('string');
});
sgml('</TERM>', sub {
my $term = pop_output();
$term =~ tr/\n/ /;
output $term;
font_off();
output "\n";
$newline_last = 1;
});

sgml('<LISTITEM>', sub {
# A bulleted list.
if($_[0]->in('ITEMIZEDLIST'))
{
output "\n" unless $newline_last++;
output ".TP 0.2i\n\\(bu\n";
}

# Need numbers.
# Assume Arabic numeration for now.
elsif($_[0]->in('ORDEREDLIST')) {
output "\n" unless $newline_last++;
output ".TP ", $_[0]->parent->ext->{'count'}++, ". \n";
}

$_[0]->ext->{'nobreak'} = 1;
});

```

```

sgml('<SIMPLELIST>', sub {
  $_[0]->ext->{'first_member'} = 1;
});

sgml('<MEMBER>', sub {
  my $parent = $_[0]->parent;

  if($parent->attribute('TYPE')->value =~ /Inline/i) {
    if($parent->ext->{'first_member'}) {
      # If this is the first member don't put any commas
      $parent->ext->{'first_member'} = 0;
    } else {
      output ", ";
    }
  } elsif($parent->attribute('TYPE')->value =~ /Vert/i) {
    output "\n" unless $newline_last++;
    output "\n";
  }
});

```

```

#####
#
# Stuff we don't know how to handle (yet)
#
#####

```

```

# Address blocks:

```

```

# Credit stuff:

```

```

#
ACKNO
# ADDRESS
# AFFILIATION
# ARTPAGENUMS
# CONTRIBUTION
# AUTHORBLURB
# AUTHORGROUP
# OTHERCREDIT
# HONORIFIC

```

```

# Areas:

```

```

# AREA
# AREASET
# AREASPEC

```

```
#####
#
# Linkage, cross references
#
#####

# Print the URL
sgml('</ULINK>', sub {
# output ' <URL:', $_[0]->attribute('URL')->value, '>';
$newline_last = 0;
});

# If cross reference target is a RefEntry,
# output CiteRefEntry-style references.
sgml('<XREF>', sub {
my $id = $_[0]->attribute('LINKEND')->value;
my $manref = $Refs->get("refentry:$id");

if($manref) {
my ($title, $sect) = ($manref =~ /(.*)(\(.*\))/);
bold_on();
output $title;
font_off();
output $sect;
} else {
$blank_xrefs++ if $write_manpages;
output "[XRef to $id]";
}

$newline_last = 0;
});

# Anchor

#####
#
# Other handlers
#
#####
```

```

man_sgml('|[lt
    ]', '<');
man_sgml('|[gt  ]', '>');
man_sgml('|[amp ]', '&');

#
# Default handlers (uncomment these if needed). Right now, these are set
# up to gag on any unrecognised elements, sdata, processing-instructions,
# or entities.
#
# sgml('start_element',sub { die "Unknown element: " . $_[0]->name; });
# sgml('end_element',"");

# This is for weeding out and escaping certain characters.
# This looks like it's inefficient since it's done on every line, but
# in reality, SGMLSpM and sgmlspl parsing ESIS takes _much_ longer.

sgml('cdata', sub
{
    if(!$write_manpages) { return; }
    elsif($raw_cdata) { output $_[0]; return; }

# Escape backslashes
$_[0] =~ s/\\|\\|\\|g;

# In non-'pre'-type elements:
if(!$nocollapse_whitespace) {
    # Change tabs to spaces
    $_[0] =~ tr/t/ /;

# Do not allow indents at beginning of line
# groff chokes on that.
if($newline_last) {
    $_[0] =~ s/^ +//;

# If the
line is all blank, don't do anything.
if($_[0] eq "") { return; }

$_[0] =~ s/^\.\|&\/.;

# Argh... roff doesn't like ' either...
$_[0] =~ s/^\'\\|&\/';
}
}

$newline_last = 0;

```

```
output $_[0];
});
```

```
# When in whitespace-collapsing mode, we disallow consecutive newlines.
```

```
sgml('re', sub
{
if($nocollapse_whitespace || !$newline_last) {
output "\n";
}

```

```
$newline_last = 1;
});
```

```
sgml('sdata',sub { die "Unknown SDATA: " . $_[0]; });
sgml('pi',sub { die "Unknown processing instruction: " . $_[0]; });
sgml('entity',sub { die "Unknown external entity: " . $_[0]->name; });
sgml('start_subdoc',sub { die "Unknown subdoc entity: " . $_[0]->name; });
sgml('end_subdoc',"");
sgml('conforming',"");
```

```
1;
```

Found in path(s):

```
* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-
bNmUq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/docbook2man-spec.pl
No license file was found, but licenses were detected in source scan.
```

```
/*
```

```
* Copyright (c) 1989 The Regents of the University of California.
* All rights reserved.
*
* This code is derived from software contributed to Berkeley by
* Mike Muuss.
*
* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:
* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
* 3. All advertising materials mentioning features or use of this software
* must display the following acknowledgement:
* This product includes software developed by the University of
* California, Berkeley and its contributors.
```

*
4. Neither the name of the University nor the names of its contributors
* may be used to endorse or promote products derived from this software
* without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.

*/

/*

* P I N G . C

*

* Using the InterNet Control Message Protocol (ICMP) "ECHO" facility,
* measure round-trip-delays and packet loss across network paths.

*

* Author -

* Mike Muuss

* U. S. Army Ballistic Research Laboratory

* December, 1983

*

* Status -

* Public Domain. Distribution Unlimited.

* Bugs -

* More statistics could always be gathered.

* This program has to run SUID to ROOT to access the ICMP socket.

*/

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/ping6.c

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/ping.c

No license file was found, but licenses were detected in source scan.

/* pg3.c: Packet Generator for packet performance testing.

*

* Copyright 2001 by Robert Olsson <robert.olsson@its.uu.se>

* Uppsala University, Sweden

*

* This program is free software; you can redistribute it and/or modify

* it under the terms of the GNU General Public License as published by
* the Free Software Foundation; either version 2 of the License, or
* (at your option) any later version.
*
*
*
*/

Found in path(s):

*/opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/Modules/pg3.c
No license file was found, but licenses were detected in source scan.

/*

* tracepath.c

*

* This program is free software; you can redistribute it and/or
* modify it under the terms of the GNU General Public License
* as published by the Free Software Foundation; either version
* 2 of the License, or (at your option) any later version.

*

* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>

*/

Found in path(s):

*/opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/tracepath.c
No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 1983, 1993

* The Regents of the University of California. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:

* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software
* must display the following acknowledgement:

* This product includes software developed by the University of
* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

*

may be used to endorse or promote products derived from this software

- * without specific prior written permission.
- *
- * THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
- * ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
- * IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
- * ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
- * FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
- * DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
- * OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
- * HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
- * LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
- * OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
- * SUCH DAMAGE.
- *
- * @(#)tftp.h 8.1 (Berkeley) 6/2/93
- */

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/tftp.h
No license file was found, but licenses were detected in source scan.

/*

- * Copyright (c) 1983 Regents of the University of California.
- * All rights reserved.
- *
- * Redistribution and use in source and binary forms, with or without
- * modification, are permitted provided that the following conditions
- * are met:
- * 1. Redistributions of source code must retain the above copyright
- * notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer in the
- * documentation and/or other materials provided with the distribution.
- * 3. All advertising materials mentioning features or use of this software
- * must display the following acknowledgement:
- * This product includes software developed by the University of
- * California, Berkeley and its contributors.
- * 4. Neither the name of the University nor the names of its contributors
- * may be used
- to endorse or promote products derived from this software
- * without specific prior written permission.
- *

- * THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
- * ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
- * IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
- * ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE

* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*/

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/tftpsubs.c
*

/opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/tftpd.c

No license file was found, but licenses were detected in source scan.

License: BSD with advertising and GPLv2+ and Rdisc

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils.spec

No license file was found, but licenses were detected in source scan.

/*

* arping.c

*

* This program is free software; you can redistribute it and/or
* modify it under the terms of the GNU General Public License
* as published by the Free Software Foundation; either version
* 2 of the License, or (at your option) any later version.

*

* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>

*/

Found in path(s):

* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/arping.c

No license file was found, but licenses were detected in source scan.

/*-

* Copyright (c) 1990, 1993

* The Regents of the University of California. All rights reserved.

*

* This code is derived from software contributed to Berkeley by

* Van Jacobson.

*

* Redistribution and use in source and binary forms, with or without

- * modification, are permitted provided that the following conditions
- * are met:
- * 1. Redistributions of source code must retain the above copyright
- * notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer in the
- * documentation and/or other materials provided with the distribution.
- * 3. All advertising materials mentioning features or use of this software
- * must display the following acknowledgement:
- * This product includes software developed by the University of
- * California, Berkeley and its contributors.
- * 4. Neither the name of the University nor the names of its contributors
- * may be used to endorse or promote products derived from this software
- * without specific prior written permission.
- *
- * THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
- * ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
- * IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
- * ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
- * FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
- * DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
- * OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
- * HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
- * LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
- * OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
- * SUCH DAMAGE.
- */

Found in path(s):

*
 /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmUq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/traceroute6.c

No license file was found, but licenses were detected in source scan.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software
4. Neither the name of the University nor the names of its contributors without specific prior written permission.

Found in path(s):

```
* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/ping.shtml
```

No license file was found, but licenses were detected in source scan.

and distributed under different licenses. For details look into corresponding

Found in path(s):

```
* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/doc/iputils.db
```

No license file was found, but licenses were detected in source scan.

```
/*
```

```
* rarpd.c RARP daemon.
```

```
*
```

```
* This program is free software; you can redistribute it and/or  
* modify it under the terms of the GNU General Public License  
* as published by the Free Software Foundation; either version  
* 2 of the License, or (at your option) any later version.
```

```
*
```

```
* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>
```

```
*/
```

Found in path(s):

```
* /opt/cola/permits/1826509821_1697762793.388391/0/iputils-20071127-24.el6-2.src.rpm-cosi-expand-archive-bNmuq1F3/iputils-s20071127.tar.bz2-cosi-expand-archive-H511K8tN/iputils-s20071127/rarpd.c
```

1.129 decorator 3.0.1

1.129.1 Available under license :

MIT License

Copyright (c) 2017 Arturas Molcanovas <a.molcanovas@gmail.com>

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER

LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.130 e2fsprogs 1.41.12

1.130.1 Available under license :

This package was added to the e2fsprogs debian source package by Theodore Ts'o <tytso@mit.edu> on Sat Mar 15 15:33:37 EST 2003

It is part of the main e2fsprogs distribution, which can be found at:

<http://sourceforge.net/projects/e2fsprogs>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright:

Copyright (C) 1999, 2001 by Andries Brouwer
Copyright (C) 1999, 2000, 2003 by Theodore Ts'o

You are free to distribute this software under the terms of the GNU Lesser (Library) General Public License.

On Debian systems, the complete text of the GNU Lesser (Library) General Public License can be found in /usr/share/common-licenses/LGPL-2. This is the Debian GNU/Linux prepackaged version of the static EXT2 file system consistency checker (e2fsck.static). The EXT2 utilities were written by Theodore Ts'o <tytso@mit.edu> and Remy Card <card@masi.ibp.fr>.

Sources were obtained from <http://sourceforge.net/projects/e2fsprogs>

Packaging is Copyright (c) 2003-2006 Theodore Ts'o <tytso@mit.edu>
Copyright (c) 1997-2003 Yann Dirson <dirson@debian.org>
Copyright (c) 2001 Alcove <<http://www.alcove.com/>>
Copyright (c) 1997 Klee Dienes
Copyright (c) 1995-1996 Michael Nonweiler <mrn20@cam.ac.uk>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright notice:

This package, the EXT2 filesystem utilities, is protected by the GNU Public License.

Copyright (c) 1993, 1994, 1995, 1996, 1997, 1998, 1999, 2000,
2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008 by Theodore Ts'o

On Debian GNU systems, the complete text of the GNU General
Public License can be found in `~/usr/share/common-licenses/GPL-2'`.

Index: tdbsa/tdb.c

--- tdbsa.orig/tdb.c

+++ tdbsa/tdb.c

@@ -4,11 +4,11 @@ Rev: 23371

Last Changed Date: 2007-06-06 20:14:06 -0400 (Wed, 06 Jun 2007)

*/

/*

- Unix SMB/CIFS implementation.
+ trivial database library - standalone version

- trivial database library - private includes

-

- Copyright (C) Andrew Tridgell 2005
+ Copyright (C) Andrew Tridgell 1999-2005
+ Copyright (C) Jeremy Allison 2000-2006
+ Copyright (C) Paul 'Rusty' Russell 2000

** NOTE! The following LGPL license applies to the tdb
** library. This does NOT imply that all of Samba is released
EXT2ED is hereby placed under the terms of the GNU General Public License.
Follows the GNU license.

Gadi Oxman, August 1995

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to

using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide

a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such

an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access

to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues),

conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this

License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any

later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively

convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY;  
for details type `show w'.
```

```
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may

consider

it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

This package was added to the e2fsprogs debian source package by Theodore Ts'o <tytso@mit.edu> on Sat Mar 15 15:33:37 EST 2003

It is part of the main e2fsprogs distribution, which can be found at:

<http://sourceforge.net/projects/e2fsprogs>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright:

Copyright (C) 1999, 2000, 2003, 2004 by Theodore Ts'o

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety,

- including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
 3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

This is the Debian GNU/Linux prepackaged version of the EXT2 file system utilities (e2fsck, mke2fs, etc.). The EXT2 utilities were written by Theodore Ts'o <tytso@mit.edu> and Remy Card <card@masi.ibp.fr>.

Sources were obtained from <http://sourceforge.net/projects/e2fsprogs>

Packaging is Copyright (c) 2003-2007 Theodore Ts'o <tytso@mit.edu>
Copyright (c) 1997-2003 Yann Dirson <dirson@debian.org>
Copyright (c) 2001 Alcove <<http://www.alcove.com/>>
Copyright (c) 1997 Klee Dienes
Copyright (c) 1995-1996 Michael Nonweiler <mrn20@cam.ac.uk>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright notice:

This package, the EXT2 filesystem utilities, is protected by the GNU Public License.

Copyright (c) 1993, 1994, 1995, 1996, 1997, 1998, 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008 by Theodore Ts'o

On Debian GNU systems, the complete text of the GNU General Public License can be found in `~/usr/share/common-licenses/GPL-2'`. This package, the EXT2 filesystem utilities, are made available under the GNU Public License version 2, with the exception of the `lib/ext2fs` and `lib/e2p` libraries, which are made available under the GNU Library

General Public License Version 2, the lib/uuid library which is made available under a BSD-style license and the lib/et and lib/ss libraries which are made available under an MIT-style license. Please see lib/uuid/COPYING for more details for the license for the files comprising the libuuid library, and the source file headers of the libet and libss libraries for more information.

The most recent officially distributed version can be found at <http://e2fsprogs.sourceforge.net>. If you need to make a distribution, that's the one you should use. If there is some reason why you'd like a more recent version that is still in ALPHA testing (i.e., either using the "WIP" test distributions or one from the hg or git repository from the development branch, please contact me (tytso@mit.edu) before you ship. The release schedules for this package are flexible, if you give me enough lead time.

Theodore Ts'o
23-June-2007

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered

only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in

themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the

Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the

operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access

to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to

refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes

make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE

OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name  
of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or

(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes  
with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine
library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain

that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and

modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact

all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2.

You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the

user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the

source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the

Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise)

that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

This is the Debian GNU/Linux prepackaged version of the Common Error Description library. It is currently distributed together with the EXT2 file system utilities, which are otherwise packaged as "e2fsprogs".

This package was put together by Yann Dirson <dirson@debian.org>, from sources obtained from a mirror of:
[tsx-11.mit.edu:/pub/linux/packages/ext2fs/](http://tsx-11.mit.edu/pub/linux/packages/ext2fs/)

From the original distribution:

Copyright 1987, 1988 by the Student Information Processing Board of the Massachusetts Institute of Technology

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of M.I.T. and the M.I.T. S.I.P.B. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. M.I.T. and the M.I.T.

S.I.P.B. make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

This is the Debian GNU/Linux prepackaged version of the EXT2 file system utilities (e2fsck, mke2fs, etc.). The EXT2 utilities were written by Theodore Ts'o <tytso@mit.edu> and Remy Card <card@masi.ibp.fr>.

Sources were obtained from <http://sourceforge.net/projects/e2fsprogs>

Packaging is copyright (c) 2003 Theodore Ts'o <tytso@mit.edu>
copyright (c) 1997-2003 Yann Dirson <dirson@debian.org>
copyright (c) 2001 Alcove <<http://www.alcove.com/>>
copyright (c) 1997 Klee Dienes
copyright (c) 1995-1996 Michael Nonweiler <mrn20@cam.ac.uk>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright notice:

This package, the EXT2 filesystem libraries, are protected by the GNU Public License.

Copyright (c) 1993, 1994, 1995, 1996, 1997, 1998, 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008 by Theodore Ts'o

On Debian GNU systems, the complete text of the GNU General Public License can be found in ``/usr/share/common-licenses/GPL-2'`. This is the Debian GNU/Linux prepackaged version of the `ss` command-line interface parsing library library. It is currently distributed together with the EXT2 file system utilities, which are otherwise packaged as "e2fsprogs".

This package was put together by Yann Dirson <dirson@debian.org>, from sources obtained from a mirror of:
tsx-11.mit.edu:/pub/linux/packages/ext2fs/

From the original distribution:

Copyright 1987, 1988 by the Student Information Processing Board of the Massachusetts Institute of Technology

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of M.I.T. and the M.I.T. S.I.P.B. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.
M.I.T.

and the M.I.T. S.I.P.B. make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty. This package was added to the e2fsprogs debian source package by Theodore Ts'o <tytso@mit.edu> on Fri Dec 14 22:24:35 EST 2007

It is part of the main e2fsprogs distribution, which can be found at:

<http://sourceforge.net/projects/e2fsprogs>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright:

Copyright (C) 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007 by Theodore Ts'o

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.131 gawk 4.0.2

1.131.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some
specially designated Free Software Foundation software, and to any
other libraries whose authors decide to use it. You can use it for
your libraries, too.

When we speak of free software, we are referring to freedom,
not
price. Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
this service if you wish), that you receive source code or can get it
if you want it, that you can change the software or use pieces of it
in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid
anyone to deny you these rights or to ask you to surrender the rights.
These restrictions translate to certain responsibilities for you if
you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis
or for a fee, you must give the recipients all the rights that we gave
you. You must make sure that they, too, receive or can get the source
code. If you link a program with the library, you must provide
complete object files to the recipients so that they can relink them
with the library, after making
changes to the library and recompiling
it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright
the library, and (2) offer you this license which gives you legal

permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must

be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based

on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or

linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding

machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing

and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year>
<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public

License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

- (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited

permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License,

in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source

as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in

source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under

this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within

the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.132 zlib 1.2.5

1.132.1 Available under license :

Boost Software License - Version 1.0 - August 17th, 2003

Permission is hereby granted, free of charge, to any person or organization obtaining a copy of the software and accompanying documentation covered by this license (the "Software") to use, reproduce, display, distribute, execute, and transmit the Software, and to prepare derivative works of the Software, and to permit third-parties to whom the Software is furnished to do so, all subject to the following:

The copyright notices in the Software and this entire statement, including the above license grant, this restriction and the following disclaimer, must be included in all copies of the Software, in whole or in part, and all derivative works of the Software, unless such copies or derivative works are solely in the form of machine-executable object code generated by a source language processor.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS

FOR A PARTICULAR PURPOSE, TITLE AND NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS OR ANYONE DISTRIBUTING THE SOFTWARE BE LIABLE FOR ANY DAMAGES OR OTHER LIABILITY, WHETHER IN CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.133 libjitterentropy v3.4.1

1.133.1 Available under license :

This code is proprietary code of Stephan Mueller <smueller@chronox.de>.

The licensee is granted access to the source code to use it for any internal purpose. The licensee is allowed to modify and recompile the code.

The licensee IS NOT granted permission to redistribute the source code or derivatives of the source code, and the binaries compiled from the source code or its derivatives to any third parties.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR

SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 2017 - 2022, Stephan Mueller <smueller@chronox.de>

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

ALTERNATIVELY, this product may be distributed under the terms of the GNU General Public License, in which case the provisions of the GPL2 are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential bad interaction between the GPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 2016 - 2022, Stephan Mueller <smueller@chronox.de>

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright

notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

ALTERNATIVELY, this product may be distributed under the terms of the GNU General Public License, in which case the provisions of the GPL2 are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential bad interaction between the GPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses

are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it,

either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to

control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.134 linux-kernel 4.14.104

1.134.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute

and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such

parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through

any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands

`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

Copyright (c) 2009-2013 QLogic Corporation

QLogic Linux qlcnic NIC Driver

You may modify and redistribute the device driver code under the
GNU General Public License (a copy of which is attached hereto as
Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your

freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have.

You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and

modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition,

mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to

this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to

address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

/* nicstar.c v0.22 Jawaid Bazyar (bazyar@hypermall.com)

* nicstar.c, M. Welsh (matt.welsh@cl.cam.ac.uk)

*

* Hacked October, 1997 by Jawaid Bazyar, Interlink Advertising Services Inc.

* <http://www.hypermall.com/>

* 10/1/97 - commented out CFG_PHYIE bit - we don't care when the PHY

* interrupts us (except possibly for removal/insertion of the cable?)

* 10/4/97 - began heavy inline documentation of the code. Corrected typos
 * and spelling mistakes.

* 10/5/97 - added code to handle PHY interrupts, disable PHY on
 * loss of link, and correctly re-enable PHY when link is
 * re-established. (put back CFG_PHYIE)

*

* Modified to work with the IDT7721 nicstar -- AAL5 (tested) only.

*

* R. D. Rechenmacher <ron@fnal.gov>, Aug. 6, 1997

*

* Linux driver for the IDT77201 NICStAR PCI ATM controller.
 * PHY component is expected to be 155 Mbps S/UNI-Lite or IDT 77155;
 * see init_nicstar() for PHY initialization to change this. This driver
 * expects the Linux ATM stack to support scatter-gather
 lists

* (skb->atm.iovcnt != 0) for Rx skb's passed to vcc->push.

*

* Implementing minimal-copy of received data:

* IDT always receives data into a small buffer, then large buffers
 * as needed. This means that data must always be copied to create
 * the linear buffer needed by most non-ATM protocol stacks (e.g. IP)
 * Fix is simple: make large buffers large enough to hold entire
 * SDU, and leave <small_buffer_data> bytes empty at the start. Then
 * copy small buffer contents to head of large buffer.

* Trick is to avoid fragmenting Linux, due to need for a lot of large
 * buffers. This is done by 2 things:

* 1) skb->destructor / skb->atm.recycle_buffer
 * combined, allow nicstar_free_rx_skb to be called to
 * recycle large data buffers

* 2) skb_clone of received buffers

* See nicstar_free_rx_skb and linearize_buffer for implementation
 * details.

*

*

*

* Copyright (c) 1996 University of Cambridge
 Computer Laboratory

*

* This program is free software; you can redistribute it and/or modify
 * it under the terms of the GNU General Public License as published by
 * the Free Software Foundation; either version 2 of the License, or
 * (at your option) any later version.

*

* This program is distributed in the hope that it will be useful,
 * but WITHOUT ANY WARRANTY; without even the implied warranty of
 * MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
 * GNU General Public License for more details.

*

- * You should have received a copy of the GNU General Public License
- * along with this program; if not, write to the Free Software
- * Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.
- *
- * M. Welsh, 6 July 1996
- *
- *
- */

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and

(2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License

along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of

a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License.

However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that

system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE

PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

Copyright (c) 2003-2013 QLogic Corporation
QLogic Linux iSCSI Driver

This program includes a device driver for Linux 3.x.
You may modify and redistribute the device driver code under the GNU General Public License (a copy of which is attached hereto as Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it

clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete

machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works.

These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the

Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software

Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

Code in this directory written at the IDA Supercomputing Research Center carries the following copyright and license.

Copyright 1993 United States Government as represented by the Director, National Security Agency. This software may be used and distributed according to the terms of the GNU General Public License, incorporated herein by reference.

In addition to the disclaimers in the GPL, SRC expressly disclaims any and all warranties, expressed or implied, concerning the enclosed software. This software was developed at SRC for use in internal research, and the intent in sharing this software is to promote the productive interchange of ideas throughout the research community. All software is furnished on an "as-is" basis. No further updates to this software should be expected. Although updates may occur, no commitment exists.

Copyright (c) 2003-2006, Marvell International Ltd.

All Rights Reserved

This program is free software; you can redistribute it and/or modify it under the terms of version 2 of the GNU General Public License as published by the Free Software Foundation.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA.

"This software program is licensed subject to the GNU General Public License (GPL). Version 2, June 1991, available at <http:

GNU General Public License

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure

the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies

to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- * a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

- * b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

- * c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if

the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

* a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

* b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

*

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for

making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and

any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.
9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.
10. If you wish to incorporate parts of the Program into other free programs

whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

one line to give the program's name and an idea of what it does.
Copyright (C) yyyy name of author

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type 'show w'. This is free software, and you are welcome to redistribute it under certain conditions; type 'show c' for details.

The hypothetical commands 'show w' and 'show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than 'show w' and 'show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program 'Gnomovision' (which makes passes at compilers) written by James Hacker.

signature
of Ty Coon, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain

that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference

between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an

appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote

it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the

Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative

work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under

Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply,

and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
Library General Public License for more details.

You should have received a copy of the GNU Library General Public
License along with this library; if not, write to the Free
Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the library, if
necessary. Here is a sample; alter
the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the
library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

The files in this directory and elsewhere which refer to this LICENCE
file are part of JFFS2, the Journalling Flash File System v2.

Copyright 2001-2007 Red Hat, Inc. and others

JFFS2 is free software; you can redistribute it and/or modify it under
the terms of the GNU General Public License as published by the Free
Software Foundation; either version 2 or (at your option) any later
version.

JFFS2 is distributed in the hope that it will be useful, but WITHOUT
ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
for more details.

You should have received a copy of the GNU General Public License along
with JFFS2; if not, write to the Free Software Foundation, Inc.,
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA.

As a special exception, if other files instantiate templates or use
macros or inline functions from these files, or you compile these
files and link them with other works to produce
a work based on these
files, these files do not by themselves cause the resulting work to be

covered by the GNU General Public License. However the source code for these files must still be made available in accordance with section (3) of the GNU General Public License.

This exception does not invalidate any other reasons why a work based on this file might be covered by the GNU General Public License.

Copyright (c) 2003-2006 QLogic Corporation
QLogic Linux Networking HBA Driver

This program includes a device driver for Linux 2.6 that may be distributed with QLogic hardware specific firmware binary file. You may modify and redistribute the device driver code under the GNU General Public License as published by the Free Software Foundation (version 2 or a later version).

You may redistribute the hardware specific firmware binary file under the following terms:

1. Redistribution of source code (only if applicable), must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistribution in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of QLogic Corporation may not be used to endorse or promote products derived from this software without specific prior written permission

REGARDLESS

OF WHAT LICENSING MECHANISM IS USED OR APPLICABLE, THIS PROGRAM IS PROVIDED BY QLOGIC CORPORATION "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

USER ACKNOWLEDGES AND AGREES THAT USE OF THIS PROGRAM WILL NOT CREATE OR GIVE GROUNDS FOR A LICENSE BY IMPLICATION, ESTOPPEL, OR

OTHERWISE IN ANY INTELLECTUAL PROPERTY RIGHTS (PATENT, COPYRIGHT, TRADE SECRET, MASK WORK, OR OTHER PROPRIETARY RIGHT) EMBODIED IN ANY OTHER QLOGIC HARDWARE OR SOFTWARE EITHER SOLELY OR IN COMBINATION WITH THIS PROGRAM.

Copyright (c) 2003-2014 QLogic Corporation

QLogic Linux FC-FCoE Driver

This program includes a device driver for Linux 3.x.

You may modify and redistribute the device driver code under the GNU General Public License (a copy of which is attached hereto as Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's

software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you

distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the

Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute

such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the

entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering

access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works.

These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other

circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software

Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

NOTE! This copyright does **not** cover user programs that use kernel services by normal system calls - this is merely considered normal use of the kernel, and does **not** fall under the heading of "derived work". Also note that the GPL below is copyrighted by the Free Software Foundation, but the instance of code that it refers to (the Linux kernel) is copyrighted by me and others who actually wrote it.

Also note that the only valid version of the GPL as far as the kernel is concerned is `_this_` particular version of the license (ie v2, not v2.2 or v3.x or whatever), unless explicitly otherwise stated.

Linus Torvalds

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is

to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium

customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License.

However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further

restrictions on the recipients' exercise
of the rights granted herein.

You are not responsible for enforcing compliance by third parties to
this License.

7. If, as a consequence of a court judgment or allegation of patent
infringement or for any other reason (not limited to patent issues),
conditions are imposed on you (whether by court order, agreement or
otherwise) that contradict the conditions of this License, they do not
excuse you from the conditions of this License. If you cannot
distribute so as to satisfy simultaneously your obligations under this
License and any other pertinent obligations, then as a consequence you
may not distribute the Program at all. For example, if a patent
license would not permit royalty-free redistribution of the Program by
all those who receive copies directly or indirectly through you, then
the only way you could satisfy both it and this License would be to
refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under
any particular
circumstance, the balance of the section is intended to
apply and the section as a whole is intended to apply in other
circumstances.

It is not the purpose of this section to induce you to infringe any
patents or other property right claims or to contest validity of any
such claims; this section has the sole purpose of protecting the
integrity of the free software distribution system, which is
implemented by public license practices. Many people have made
generous contributions to the wide range of software distributed
through that system in reliance on consistent application of that
system; it is up to the author/donor to decide if he or she is willing
to distribute software through any other system and a licensee cannot
impose that choice.

This section is intended to make thoroughly clear what is believed to
be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in
certain countries either by patents or by copyrighted
interfaces, the
original copyright holder who places the Program under this License
may add an explicit geographical distribution limitation excluding
those countries, so that distribution is permitted only in or among
countries not thus excluded. In such case, this License incorporates
the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions

of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

Copyright (c) 2003-2011 QLogic Corporation
QLogic Linux qlge NIC Driver

You may modify and redistribute the device driver code under the
GNU General Public License (a copy of which is attached hereto as
Exhibit A) published by the Free Software Foundation (version 2).

EXHIBIT A

GNU GENERAL PUBLIC LICENSE Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit
to
using it. (Some other Free Software Foundation software is covered by
the GNU Lesser General Public License instead.) You can apply it to
your programs, too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
this service if you wish), that you receive source code or can get it
if you want it, that you can change the software or use pieces of it
in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not

covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but

does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those

sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component

itself accompanies the executable.

If

distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented

by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals

of preserving
the free status of all derivatives of our free software and
of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

FlashPoint Driver Developer's Kit
Version 1.0

Copyright 1995-1996 by Mylex Corporation
All Rights Reserved

This program is free software; you may redistribute and/or modify it under the terms of either:

a) the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version,

or

b) the "BSD-style License" included below.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY, without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See either the GNU General Public License or the BSD-style License below for more details.

You should have received a copy of the GNU General Public License along

with this program; if not, write to the Free Software Foundation, Inc.,
675 Mass Ave, Cambridge, MA 02139, USA.

The BSD-style License is as follows:

Redistribution

and use in source and binary forms, with or without
modification, are permitted provided that the following conditions are
met:

1. Redistributions of source code must retain this LICENSE.FlashPoint
file, without modification, this list of conditions, and the following
disclaimer. The following copyright notice must appear immediately at
the beginning of all source files:

Copyright 1995-1996 by Mylex Corporation. All Rights Reserved

This file is available under both the GNU General Public License
and a BSD-style copyright; see LICENSE.FlashPoint for details.

2. Redistributions in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in the
documentation and/or other materials provided with the distribution.
3. The name of Mylex Corporation may not be used to endorse or promote
products derived from this software without specific prior written
permission.

THIS SOFTWARE

IS PROVIDED BY MYLEX CORP. ``AS IS" AND ANY EXPRESS OR
IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES
OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN
NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT,
INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES
(INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR
SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER
CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

1.135 dash 0.5.5.1-4.e16

1.135.1 Available under license :

Copyright (c) 1989-1994

The Regents of the University of California. All rights reserved.

Copyright (c) 1997 Christos Zoulas. All rights reserved.

Copyright (c) 1997-2005

Herbert Xu <herbert@gondor.apana.org.au>. All rights reserved.

This code is derived from software contributed to Berkeley by Kenneth Almquist.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS

SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

mksignames.c:

This file is not directly linked with dash. However, its output is.

Copyright (C) 1992 Free Software Foundation, Inc.

This file is part of GNU Bash, the Bourne Again SHell.

Bash is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version.

Bash is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License

for more details.

You should have received a copy of the GNU General Public License with your Debian GNU/Linux system, in `/usr/share/common-licenses/GPL`, or with the Debian GNU/Linux hello source package as the file `COPYING`. If not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111 USA.

1.136 gamin 0.1.10-9.el6

1.136.1 Available under license :

See the `AUTHORS` and the `COPYING` file for informations.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software

sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated

interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the

application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany

it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse

engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally

accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not

distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and

"any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the

ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

Gamin is a file and directory monitoring system defined to be a subset of the FAM (File Alteration Monitor) system.

Copyright (C) 2004 Daniel Veillard <veillard@redhat.com>

also partly

Copyright (C) 2003 James Willcox <jwillcox@gnome.org>

Copyright (C) 2003 Corey Bowers <cobowers@indiana.edu>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Red Hat, Inc., hereby disclaims all copyright interest in the library `gamin' (a file alteration monitor) written by Daniel Veillard.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

1.137 libusb-compat 0.1.12-23.el6

1.137.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who decide to use it. You
can use it too, but we suggest
you first think carefully about whether
this license or the ordinary General Public License is the better
strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of
it in new free programs; and that you are informed that you can do
these things.

To protect your rights, we need to make restrictions that forbid
distributors to deny you these rights or to ask you to surrender these
rights. These restrictions translate to certain responsibilities for
you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis
or for a fee, you must give the recipients
all the rights that we gave
you. You must make sure that they, too, receive or can get the source

code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without

limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or

table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing

the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the

original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the

library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

libusb is covered by the LGPL:

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA.

Alternatively, the files usb.h.in and/or usb.h may be licensed under the BSD license:

Copyright (c) 2000-2003 Johannes Erdfelt <johannes@erdfelt.com>
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT

NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.138 readline 6.0-4.el6

1.138.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive

or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees"

and

"recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that

Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of

your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section

7. This requirement modifies the requirement in section 4 to

"keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical

medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option

remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating

where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting

any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so

that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1

above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by

modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each

time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED

TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN
IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w` and `show c` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w` and `show c`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.139 checkpolicy 2.0.22-1.el6

1.139.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses

are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it,

either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to

control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.140 groff 1.18.1.4-21.el6

1.140.1 Available under license :

GNU Free Documentation License

Version 1.1, March 2000

Copyright (C) 2000 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

0. PREAMBLE

The purpose of this License is to make a manual, textbook, or other written document "free" in the sense of freedom: to assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of "copyleft", which means that derivative works of the document must themselves be free in the same sense. It complements the GNU General Public License, which is a copyleft license designed for free software.

We have designed this

License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

1. APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. The "Document", below, refers to any such manual or work. Any member of the public is a licensee, and is addressed as "you".

A "Modified Version" of the Document means any work containing the

Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A "Secondary Section" is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (For example, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The "Invariant Sections" are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, whose contents can be viewed and edited directly and straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup has been designed to thwart or discourage subsequent modification by readers is not Transparent. A copy that is not "Transparent" is called "Opaque".

Examples of suitable formats for Transparent copies include plain ASCII without markup, Texinfo input format, LaTeX input format, SGML or XML using a publicly available DTD, and standard-conforming simple HTML designed for human modification. Opaque formats include PostScript, PDF, proprietary formats that can be read and edited only by proprietary word processors, SGML or XML for which the DTD and/or processing tools are not generally available, and the machine-generated HTML produced by some word processors for output purposes only.

The "Title Page" means, for a printed book, the title page itself,

plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, "Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

2. VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures

to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

3. COPYING IN QUANTITY

If you publish printed copies of the Document numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition. Copying with changes limited to the covers, as long as they preserve the

title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a publicly-accessible computer-network location containing a complete

Transparent copy of the Document, free of added material, which the general network-using public has access to download anonymously at no charge using public-standard network protocols. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

4. MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

- A. Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.
- B. List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has less than five).
- C. State on the Title page the name of the publisher of the Modified Version, as the publisher.
- D. Preserve all the copyright notices of the Document.
- E. Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.
- F. Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.
- G. Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.
- H. Include an unaltered copy of this License.
- I. Preserve the section entitled "History", and its title, and add to

it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section entitled "History" in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

J. Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the "History" section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

K.

In any section entitled "Acknowledgements" or "Dedications", preserve the section's title, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

L. Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

M. Delete any section entitled "Endorsements". Such a section may not be included in the Modified Version.

N. Do not retitle any existing section as "Endorsements" or to conflict in title with any Invariant Section.

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice.

These

titles must be distinct from any other section titles.

You may add a section entitled "Endorsements", provided it contains nothing but endorsements of your Modified Version by various parties--for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit

permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

5. COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections entitled "History" in the various original documents, forming one section entitled "History"; likewise combine any sections entitled "Acknowledgements", and any sections entitled "Dedications". You must delete all sections entitled "Endorsements."

6. COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

7. AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, does not as a whole count as a Modified Version of the Document, provided no compilation copyright is claimed for the compilation. Such a compilation is called an "aggregate", and this License does not apply to the other self-contained works thus compiled with the Document, on account of their being thus compiled, if they are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one quarter of the entire aggregate, the Document's Cover Texts may be placed on covers that surround only the Document within the aggregate. Otherwise they must appear on covers around the whole aggregate.

8. TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4.

Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License provided that you also include the original English version of this License. In case of a disagreement between the translation and the original English version of this License, the original English version will prevail.

9. TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided for under this License. Any other attempt to copy, modify, sublicense or distribute the Document is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

10. FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See <http://www.gnu.org/copyleft/>.

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation.

ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

Copyright (c) YEAR YOUR NAME.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.1 or any later version published by the Free Software Foundation; with the Invariant Sections being LIST THEIR TITLES, with the Front-Cover Texts being LIST, and with the Back-Cover Texts being LIST. A copy of the license is included in the section entitled "GNU Free Documentation License".

If you have no Invariant Sections, write "with no Invariant Sections" instead of saying which ones are invariant. If you have no Front-Cover Texts, write "no Front-Cover Texts" instead of "Front-Cover Texts being LIST"; likewise for Back-Cover Texts.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

AUTHOR

Peter Schaffter (df191@ncf.ca)
15, chemin Brunette
RR 2, CP 406

Ste-Ccile-de-Masham (Qubec)
CANADA

The groff macro file om.tmac and the html documentation pertaining to it are copyright (c) 2002 Peter Schaffter.

om.tmac is issued under the GNU General Public License, a full copy of which can be had at

<http://www.gnu.org/licenses/gpl.html>

The html documentation pertaining to om.tmac is issued under the GNU Free Documentation License, a full copy of which can be had at

<http://www.gnu.org/copyleft/fdl.html>

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1990, 1991, 1992 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid

anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program

is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of

this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering

access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other

circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version 2  
of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
```

GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.141 libnih 1.0.1-7.el6

1.141.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies

of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the

program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole
or in part contains or is derived from the Program or any
part thereof, to be licensed as a whole at no charge to all third
parties under the terms of this License.

c) If the modified program normally reads commands interactively
when run, you must cause it, when started running for such
interactive use in the most ordinary way, to print or display an
announcement including an appropriate copyright notice and a
notice that there is no warranty (or else, saying that you provide
a warranty) and that users may redistribute the program under
these conditions, and telling the user how to view a copy of this
License. (Exception: if the Program itself is interactive but
does not normally print such an announcement, your work based on
the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If
identifiable sections of that work are not derived from the Program,
and can be reasonably considered
independent and separate works in
themselves, then this License, and its terms, do not apply to those
sections when you distribute them as separate works. But when you
distribute the same sections as part of a whole which is a work based
on the Program, the distribution of the whole must be on the terms of
this License, whose permissions for other licensees extend to the
entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest
your rights to work written entirely by you; rather, the intent is to
exercise the right to control the distribution of derivative or
collective works based on the Program.

In addition, mere aggregation of another work not based on the Program
with the Program (or with a work based on the Program) on a volume of
a storage or distribution medium does not bring the other work under
the scope of this License.

3. You may copy and distribute the Program (or a work based
on it,
under Section 2) in object code or executable form under the terms of
Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable
source code, which must be distributed under the terms of Sections
1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three
years, to give any third party, for a charge no more than your

cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each

time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates

the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your

school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.142 diffutils 2.8.1-28.el6

1.142.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid

anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program

is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based

on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under

any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,

or

(at your option) any later version.

This program is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.143 mingetty 1.08-5.el6

1.143.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections

1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and

all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the

original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER

PROGRAMS),
EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE
POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version 2 of  
the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program; if not, write to the Free Software  
Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.
```

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may

be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.144 ustr 1.0.4-9.1.e16

1.144.1 Available under license :

Copyright 2007 James Antill

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE FREEBSD PROJECT ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FREEBSD PROJECT OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS

INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The views and conclusions contained in the software and documentation are those of the authors and should not be interpreted as representing official policies, either expressed or implied, of the FreeBSD Project.

This code is multi Licensed under all/any one of:

LGPLv2+ - http://www.and.org/ustr/LICENSE_LGPL
New Style BSD (2 clause) - http://www.and.org/ustr/LICENSE_BSD
MIT - http://www.and.org/ustr/LICENSE_MIT

...if that isn't enough for you, please send an email to me. The point is for the license to not matter.

Copyright (c) 2007 James Antill

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public

Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot

effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is

linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's

complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based

on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or

linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a)

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.
- b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they

do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by

the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our

decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library.
It is safest to attach them to the start of each source file
to most
effectively convey the exclusion of warranty; and each file should
have at least the "copyright" line and a pointer to where the full
notice is found.

<one line to give the library's name and a brief idea of what it
does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or
modify it under the terms of the GNU Lesser General Public
License as published by the Free Software Foundation; either
version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public
License along with this library; if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston,
MA 02111-1307 USA

Also add information on how to contact you by electronic and paper
mail.

You should also get your employer (if you work as a programmer) or
your
school, if any, to sign a "copyright disclaimer" for the library, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the
library `Frob' (a library for tweaking knobs) written by James
Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.145 which 2.19-6.el6

1.145.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for
software and other kinds of works.

The licenses for most software and other practical works are designed
to take away your freedom to share and change the works. By contrast,
the GNU General Public License is intended to guarantee your freedom to
share and change all versions of a program--to make sure it remains free
software for all its users. We, the Free Software Foundation, use the
GNU General Public License for most of our software; it applies also to
any other work released this way by its authors. You can apply it to
your programs, too.

When we speak of free software, we are referring to
freedom, not
price. Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
them if you wish), that you receive source code or can get it if you
want it, that you can change the software or use pieces of it in new
free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you
these rights or asking you to surrender the rights. Therefore, you have
certain responsibilities if you distribute copies of the software, or if
you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether
gratis or for a fee, you must pass on to the recipients the same
freedoms that you received. You must make sure that they, too, receive
or can get the source code. And you must show them these terms so they
know their rights.

Developers that use the GNU GPL protect your rights with two steps:

- (1)
assert copyright on the software, and (2) offer you this License
giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains
that there is no warranty for this free software. For both users' and

authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's

System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article

11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as

part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or

limiting liability differently from the terms of sections 15 and 16 of this License; or

b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or

c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or

d) Limiting the use for publicity purposes of names of licensors or authors of the material; or

e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or

modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that

transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may

not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS"

WITHOUT WARRANTY

OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by

the Free Software Foundation, either version 3 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short
notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate
parts of the General Public License. Of course, your program's commands
might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school,
if any, to sign a "copyright disclaimer" for the program, if necessary.
For more information on this, and how to apply and follow the GNU GPL, see
<http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program
into proprietary programs. If your program is a subroutine library, you
may consider it more useful to permit linking proprietary applications with
the library. If this is what you want to
do, use the GNU Lesser General
Public License instead of this License. But first, please read
<http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.146 epel-release 6-8

1.146.1 Available under license :

The following copyright applies to the Red Hat Linux compilation and any
portions of Red Hat Linux it does not conflict with. Whenever this
policy does conflict with the copyright of any individual portion of Red Hat
Linux, it does not apply.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General

Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain

that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it,

under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not

signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO

MAY MODIFY AND/OR
REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES,
INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING
OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED
TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY
YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER
PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE
POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
```

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>,
1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.147 libutempter 1.1.5-4.1.el6

1.147.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that

any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact

all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that

uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on

the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent

license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free

programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will

be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full

notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.148 selinux 2.0.22-1.el6

1.148.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any

part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be

distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the

original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands

`show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if

necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.149 libusb 0.1.12-23.el6

1.149.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who decide to use it. You
can use it too, but we suggest
you first think carefully about whether
this license or the ordinary General Public License is the better
strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge

for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary

General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License").

Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to

a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any executables

containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user

installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is

implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR

OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!
libusb is covered by the LGPL:

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA.

Alternatively, the files usb.h.in and/or usb.h may be licensed under the BSD license:

Copyright (c) 2000-2003 Johannes Erdfelt <johannes@erdfelt.com>
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright

- notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
 3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.150 readline 6.0

1.150.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for

them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your

rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the

Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years

and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family,

or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you

received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a

consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment

to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you

have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the

Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the

source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you

conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or

collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the

integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES

PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.151 makedev 3.24-6.el6

1.151.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and

modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole

or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further

restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will

be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.152 libffi 3.0.5-3.2.e16

1.152.1 Available under license :

libffi - Copyright (c) 1996-2008 Red Hat, Inc and others.
See source files for details.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the ``Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED ``AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.153 kerberos 1.10.3-10.e16_4.4

1.153.1 Available under license :

[NOTE: MIT has only incorporated the mechglue and spnego change, and not the incremental propagation changes. The filenames are different between the Sun and MIT sources. The actual MIT filenames appear in the top-level README file. Original text of Sun's LICENSE file follows.]

Subject to the license set forth below, Sun Microsystems, Inc. donates the attached files to MIT for the purpose of including these modifications and additions in future versions of the Kerberos system.

Many of the files attached are subject to licenses issued by other entities, including OpenVision, MIT, and FundsXpress. See the individual files, and/or related Readme files, for these licenses.

In addition Sun requires that the license set forth below be incorporated into any future version of the Kerberos system which contains portions of the files attached. The following files must be listed, in the top level Readme file, as being provided subject to such license:

```
cmd/krb5/ipropl/ipropl.x
cmd/krb5/ipropl/ipropl_hdr.h
cmd/krb5/kadmin/server/ipropl_svc.c
cmd/krb5/kproplog/kproplog.c
cmd/krb5/slave/kpropd_rpc.c
lib/gss_mechs/mech_krb5/et/kdb5_err.c
lib/gss_mechs/mech_spnego/mech/gssapiP_spnego.h
lib/gss_mechs/mech_spnego/mech/spnego_mech.c
lib/krb5/kadm5/kadm_host_srv_names.c
lib/krb5/kdb/kdb_convert.c
lib/krb5/kdb/kdb_hdr.h
lib/krb5/kdb/kdb_log.c
lib/krb5/kdb/kdb_log.h
lib/libgss/g_accept_sec_context.c
lib/libgss/g_acquire_cred.c
lib/libgss/g_canon_name.c
lib/libgss/g_compare_name.c
lib/libgss/g_context_time.c
lib/libgss/g_delete_sec_context.c
lib/libgss/g_dsp_name.c
lib/libgss/g_dsp_status.c
lib/libgss/g_dup_name.c
lib/libgss/g_exp_sec_context.c
lib/libgss/g_export_name.c
lib/libgss/g_glue.c
lib/libgss/g_imp_name.c
lib/libgss/g_imp_sec_context.c
lib/libgss/g_init_sec_context.c
lib/libgss/g_initialize.c
lib/libgss/g_inquire_context.c
lib/libgss/g_inquire_cred.c
lib/libgss/g_inquire_names.c
lib/libgss/g_process_context.c
```

lib/libgss/g_rel_buffer.c
lib/libgss/g_rel_cred.c
lib/libgss/g_rel_name.c
lib/libgss/g_rel_oid_set.c
lib/libgss/g_seal.c
lib/libgss/g_sign.c
lib/libgss/g_store_cred.c
lib/libgss/g_unseal.c
lib/libgss/g_userok.c
lib/libgss/g_utils.c
lib/libgss/g_verify.c
lib/libgss/gssd_pname_to_uid.c
uts/common/gssapi/include/gssapi_err_generic.h
uts/common/gssapi/include/mechglueP.h

Sun's

License is as follows:

Copyright (c) 2004 Sun Microsystems, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third

parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium

customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to

these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions

of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS),

EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

@iftex

@begingroup

@smallfonts @rm

@end iftex

Copyright @copyright{ } 1985-2012 by the Massachusetts Institute of Technology.

All rights reserved.

@quotation

Export of software employing encryption from the United States of
America may require a specific license from the United States
Government. It is the responsibility of any person or organization
contemplating export to obtain such a license before exporting.

@end quotation

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and
distribute this software for any purpose and without fee is hereby
granted, provided that the above copyright notice appear in all copies
and that both that copyright notice and this permission notice appear
in supporting documentation, and that the name of M.I.T. not be used
in advertising or publicity pertaining to distribution of the software
without specific, written prior permission. Furthermore if you modify
this software you must label your software as modified software and
not distribute it

in such a fashion that it might be confused with the
original MIT software. M.I.T. makes no representations about the
suitability of this software for any purpose. It is provided ``as
is" without express or implied warranty.

Documentation components of this software distribution are licensed
under a Creative Commons Attribution-ShareAlike 3.0 Unported License.
(@uref{<http://creativecommons.org/licenses/by-sa/3.0/>})

Individual source code files are copyright MIT, Cygnus Support,
Novell, OpenVision Technologies, Oracle, Red Hat, Sun Microsystems,
FundsXpress, and others.

Project Athena, Athena, Athena MUSE, Discuss, Hesiod, Kerberos, Moira, and Zephyr are trademarks of the Massachusetts Institute of Technology (MIT). No commercial use of these trademarks may be made without prior written permission of MIT.

``Commercial use" means use of a name in a product or other for-profit manner. It does NOT prevent a commercial firm from referring to the MIT trademarks in order to convey information (although in doing so, recognition of their trademark status should be given).

@cdivider

The following copyright and permission notice applies to the OpenVision Kerberos Administration system located in @code{kadmin/create}, @code{kadmin/dbutil}, @code{kadmin/passwd}, @code{kadmin/server}, @code{lib/kadm5}, and portions of @code{lib/rpc}:

@quotation

Copyright, OpenVision Technologies, Inc., 1993-1996, All Rights Reserved

WARNING: Retrieving the OpenVision Kerberos Administration system source code, as described below, indicates your acceptance of the following terms. If you do not agree to the following terms, do not retrieve the OpenVision Kerberos administration system.

You may freely use and distribute the Source Code and Object Code compiled from it, with or without modification, but this Source Code is provided to you ``AS IS" EXCLUSIVE OF ANY WARRANTY, INCLUDING, WITHOUT LIMITATION, ANY WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE, OR ANY OTHER WARRANTY, WHETHER EXPRESS OR IMPLIED. IN NO EVENT WILL OPENVISION HAVE ANY LIABILITY FOR ANY LOST PROFITS, LOSS OF DATA OR COSTS OF PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES, OR FOR ANY SPECIAL, INDIRECT, OR CONSEQUENTIAL DAMAGES ARISING OUT OF THIS AGREEMENT, INCLUDING, WITHOUT LIMITATION, THOSE RESULTING FROM THE USE OF THE SOURCE CODE, OR THE FAILURE OF THE SOURCE CODE TO PERFORM, OR FOR ANY OTHER REASON.

OpenVision retains all copyrights in the donated Source Code. OpenVision also retains copyright to derivative works of the Source Code, whether created by OpenVision or by a third party. The OpenVision copyright notice must be preserved if derivative works are made based on the donated Source Code.

OpenVision Technologies, Inc. has donated this Kerberos Administration system to MIT for inclusion in the standard Kerberos 5 distribution.

This donation underscores our commitment to continuing Kerberos technology development and our gratitude for the valuable work which has been performed by MIT and the Kerberos community.

@cdivider

Portions contributed by Matt Crawford were work performed at Fermi National Accelerator Laboratory, which is operated by Universities Research Association, Inc., under contract DE-AC02-76CHO3000 with the U.S. Department of Energy.

@cdivider

Portions of `src/lib/crypto` have the following copyright:

Copyright 1998 by the FundsXpress, INC.

All rights reserved.

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of FundsXpress. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. FundsXpress makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

THIS SOFTWARE IS PROVIDED "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

@cdiver

The implementation of the AES encryption algorithm in
@code{src/lib/crypto/builtin/aes} has the following copyright:

@quotation

Copyright @copyright{ } 2001, Dr Brian Gladman @code{<brg@@gladman.uk.net>},
Worcester, UK. @*

All rights reserved.

LICENSE TERMS

The free distribution and use of this software in both source and binary
form is allowed

(with or without changes) provided that:

@enumerate 1

@item

distributions of this source code include the above copyright
notice, this list of conditions and the following disclaimer;

@item

distributions in binary form include the above copyright
notice, this list of conditions and the following disclaimer
in the documentation and/or other associated materials;

@item

the copyright holder's name is not used to endorse products
built using this software without specific written permission.

@end enumerate

DISCLAIMER

This software is provided 'as is' with no explicit or implied warranties
in respect of any properties, including, but not limited to, correctness
and fitness for purpose.

@end quotation

@cdiver

Portions contributed by Red Hat, including the pre-authentication
plug-in framework and the NSS crypto implementation, contain the
following copyright:

@quotation

Copyright @copyright{ } 2006 Red Hat, Inc. @*

Portions copyright @copyright{ } 2006 Massachusetts Institute of Technology @*

All

Rights Reserved. @*

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@itemize

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@item

Neither the name of Red Hat, Inc., nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

@end itemize

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER

OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivider

The bundled verto source code is subject to the following license:

@quotation

Copyright 2011 Red Hat, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be

included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

@end quotation

@cdivider

The implementations of GSSAPI mechglue in GSSAPI-SPNEGO in @code{src/lib/gssapi}, including the following files:

@smallexample

lib/gssapi/generic/gssapi_err_generic.et
lib/gssapi/mechglue/g_accept_sec_context.c
lib/gssapi/mechglue/g_acquire_cred.c
lib/gssapi/mechglue/g_canon_name.c
lib/gssapi/mechglue/g_compare_name.c
lib/gssapi/mechglue/g_context_time.c
lib/gssapi/mechglue/g_delete_sec_context.c
lib/gssapi/mechglue/g_dsp_name.c
lib/gssapi/mechglue/g_dsp_status.c
lib/gssapi/mechglue/g_dup_name.c
lib/gssapi/mechglue/g_exp_sec_context.c
lib/gssapi/mechglue/g_export_name.c
lib/gssapi/mechglue/g_glue.c
lib/gssapi/mechglue/g_imp_name.c
lib/gssapi/mechglue/g_imp_sec_context.c
lib/gssapi/mechglue/g_init_sec_context.c
lib/gssapi/mechglue/g_initialize.c
lib/gssapi/mechglue/g_inquire_context.c
lib/gssapi/mechglue/g_inquire_cred.c
lib/gssapi/mechglue/g_inquire_names.c
lib/gssapi/mechglue/g_process_context.c
lib/gssapi/mechglue/g_rel_buffer.c
lib/gssapi/mechglue/g_rel_cred.c
lib/gssapi/mechglue/g_rel_name.c
lib/gssapi/mechglue/g_rel_oid_set.c
lib/gssapi/mechglue/g_seal.c
lib/gssapi/mechglue/g_sign.c
lib/gssapi/mechglue/g_store_cred.c
lib/gssapi/mechglue/g_unseal.c
lib/gssapi/mechglue/g_userok.c

```
lib/gssapi/mechglue/g_utils.c
lib/gssapi/mechglue/g_verify.c
lib/gssapi/mechglue/gssd_pname_to_uid.c
lib/gssapi/mechglue/mglueP.h
lib/gssapi/mechglue/oid_ops.c
lib/gssapi/spnego/gssapiP_spnego.h
lib/gssapi/spnego/spnego_mech.c
@end
smallexample
```

and the initial implementation of incremental propagation, including the following new or changed files:

```
@smallexample
include/ipropr_hdr.h
kadmin/server/ipropr_svc.c
lib/kdb/ipropr.x
lib/kdb/kdb_convert.c
lib/kdb/kdb_log.c
lib/kdb/kdb_log.h
lib/krb5/error_tables/kdb5_err.et
slave/kpropd_rpc.c
slave/kproplog.c
@end smallexample
```

are subject to the following license:

```
@quotation
Copyright © 2004 Sun Microsystems, Inc.
```

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE

SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

@end quotation

@cdivider

@value{PRODUCT} includes documentation and software developed at the University of California at Berkeley, which includes this copyright notice:

@quotation

Copyright © 1983 Regents of the University of California. All rights reserved.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@enumerate

1

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@item

Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

@end enumerate

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES;

LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivider

Portions contributed by Novell, Inc., including the LDAP database backend, are subject to the following license:

@quotation

Copyright © 2004-2005, Novell, Inc.®

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@itemize

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@item

The

copyright holder's name is not used to endorse or promote products derived from this software without specific prior written permission.

@end itemize

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS ``AS IS'' AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivider

Portions funded by Sandia National Laboratory and developed by the University of Michigan's Center for Information Technology Integration, including the PKINIT implementation, are subject to the following license:

@quotation

COPYRIGHT © 2006-2007®

THE REGENTS OF THE UNIVERSITY OF MICHIGAN@*
ALL RIGHTS RESERVED

Permission is granted to use, copy, create derivative works and redistribute this software and such derivative works for any purpose, so long as the name of The University of Michigan is not used in any advertising or publicity pertaining to the use of distribution of this software without specific, written prior authorization. If the above copyright notice or any other identification of the University of Michigan is included in any copy of any portion of this software, then the disclaimer below must also be included.

THIS SOFTWARE IS PROVIDED AS IS, WITHOUT REPRESENTATION FROM THE UNIVERSITY OF MICHIGAN AS TO ITS FITNESS FOR ANY PURPOSE, AND WITHOUT WARRANTY BY THE UNIVERSITY OF MICHIGAN OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING WITHOUT LIMITATION THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE REGENTS OF THE UNIVERSITY OF MICHIGAN SHALL NOT BE LIABLE FOR ANY DAMAGES, INCLUDING SPECIAL, INDIRECT, INCIDENTAL, OR CONSEQUENTIAL DAMAGES, WITH RESPECT TO ANY CLAIM ARISING OUT OF OR IN CONNECTION WITH THE USE OF THE SOFTWARE, EVEN IF IT HAS BEEN OR IS HEREAFTER ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@end quotation

@cdivider

The pkcs11.h file included in the PKINIT code has the following license:

@quotation

Copyright 2006 g10 Code GmbH@*

Copyright 2006 Andreas Jellinghaus

This file is free software; as a special exception the author gives unlimited permission to copy and/or distribute it, with or without modifications, as long as this notice is preserved.

This file is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY, to the extent permitted by law; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

@end quotation

@cdivider

Portions contributed by Apple Inc. are subject to the following license:

@quotation

Copyright 2004-2008 Apple Inc. All Rights Reserved.

@quotation

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

@end quotation

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Apple Inc. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Apple Inc. makes no representations about the suitability of this

software for any purpose. It is provided ``as is" without express or implied warranty.

THIS SOFTWARE IS PROVIDED ``AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

@end quotation

@cdivider

The implementations of UTF-8 string handling in src/util/support and src/lib/krb5/unicode are subject to the following copyright and permission notice:

@quotation

The OpenLDAP Public License@*
Version 2.8, 17 August 2003

Redistribution and use of this software and associated documentation ("Software"), with or without modification, are permitted provided that the following conditions are met:

@enumerate 1

@item

Redistributions in source form must retain copyright statements and notices,

@item

Redistributions in binary form must reproduce applicable copyright statements and notices, this list of conditions, and the following disclaimer in the documentation and/or other materials

provided

with the distribution, and

@item

Redistributions must contain a verbatim copy of this document.

@end enumerate

The OpenLDAP Foundation may revise this license from time to time.

Each revision is distinguished by a version number. You may use this Software under terms of this license revision or under the terms of any subsequent revision of the license.

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND ITS CONTRIBUTORS ``AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OPENLDAP FOUNDATION, ITS CONTRIBUTORS, OR THE AUTHOR(S) OR OWNER(S) OF THE SOFTWARE BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The names of the authors and copyright holders must not be used in advertising or otherwise to promote the sale, use or other dealing in this Software without specific, written prior permission. Title to copyright in this Software shall at all times remain with copyright holders.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Copyright 1999-2003 The OpenLDAP Foundation, Redwood City, California, USA. All Rights Reserved. Permission to copy and distribute verbatim copies of this document is granted.

@end quotation

@cdivider

Marked test programs in src/lib/krb5/krb have the following copyright:

@iftex
@set odiaeresis @"o
@end iftex
@ifinfo
@set odiaeresis
@end ifinfo
@quotation
Copyright @copyright{ } 2006 Kungliga Tekniska H@value{odiaeresis}gskolan@*
(Royal Institute of Technology,
Stockholm, Sweden).@*
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

@enumerate 1
@item
Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.
@item
Redistributions in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in the
documentation and/or other materials provided with the distribution.
@item
Neither the name of KTH nor the names of its contributors may be
used to endorse or promote products derived from this software without
specific prior written permission.
@end enumerate

THIS SOFTWARE IS PROVIDED BY KTH AND ITS CONTRIBUTORS ``AS IS" AND ANY
EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR
PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL KTH OR ITS
CONTRIBUTORS BE
LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR
CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF
SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR
BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR
OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF
ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.
@end quotation

@cdivider

Portions of the RPC implementation in src/lib/rpc and src/include/gssrpc

have the following copyright and permission notice:

@quotation

Copyright © 2010, Oracle America, Inc.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@enumerate 1

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions

in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@item

Neither the name of the "Oracle America, Inc." nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

@end enumerate

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cddivider

@quotation

Copyright © 2006, 2007, 2009

NTT (Nippon Telegraph and Telephone Corporation). All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions

are met:

@enumerate 1

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer as the first lines of this file unmodified.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@end enumerate

THIS SOFTWARE IS PROVIDED BY NTT ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL NTT BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivder

@quotation

Copyright 2000 by Carnegie Mellon University

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of

Carnegie Mellon

University not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN

ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

@end quotation

@cdivider

@quotation

Copyright © 2002 Naval Research Laboratory (NRL/CCS)

Permission to use, copy, modify and distribute this software and its documentation is hereby granted, provided that both the copyright notice and this permission notice appear in all copies of the software, derivative works or modified versions, and any portions thereof.

NRL

ALLOWS FREE USE OF THIS SOFTWARE IN ITS "AS IS" CONDITION AND DISCLAIMS ANY LIABILITY OF ANY KIND FOR ANY DAMAGES WHATSOEVER RESULTING FROM THE USE OF THIS SOFTWARE.

@end quotation

@cdivider

Portions extracted from Internet RFCs have the following copyright notice:

@quotation

Copyright © The Internet Society (2006).

This document is subject to the rights, licenses and restrictions contained in BCP 78, and except as set forth therein, the authors retain all their rights.

This document and the information contained herein are provided on an "AS IS" basis and THE CONTRIBUTOR, THE ORGANIZATION HE/SHE REPRESENTS OR IS SPONSORED BY (IF ANY), THE INTERNET SOCIETY AND THE INTERNET ENGINEERING TASK FORCE DISCLAIM ALL WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY WARRANTY THAT THE USE OF THE INFORMATION HEREIN WILL NOT INFRINGE ANY RIGHTS OR ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

@end quotation

@cdivider

@quotation

Copyright

© 1991, 1992, 1994 by Cygnus Support.

Permission to use, copy, modify, and

distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation. Cygnus Support makes no representations about the suitability of this software for any purpose. It is provided ``as is" without express or implied warranty.

@end quotation

@cdivider

@quotation

Copyright @copyright{ } 2006 Secure Endpoints Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the ``Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished

to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED ``AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

@end quotation

@cdivider

Portions of the implementation of the Fortuna-like PRNG are subject to the following notice:

@quotation

Copyright @copyright{ } 2005 Marko Kreen@*

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@enumerate 1

@item

Redistributions

of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@end enumerate

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT

OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@quotation

Copyright © 1994 by the University of Southern California

@quotation

EXPORT OF THIS SOFTWARE from the United States of America may require a specific license from the United States Government.

It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

@end quotation

WITHIN THAT CONSTRAINT, permission to copy, modify, and distribute this software and its documentation in source and binary forms is hereby granted, provided that any documentation or other materials related to such distribution or use acknowledge that the software was developed by the University of Southern California.

DISCLAIMER OF WARRANTY. THIS SOFTWARE IS PROVIDED ``AS IS". The University of Southern California MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. By way of example, but not limitation, the University of Southern

California MAKES NO

REPRESENTATIONS OR WARRANTIES OF MERCHANTABILITY OR FITNESS FOR ANY

PARTICULAR PURPOSE. The University of Southern California shall not be held liable for any liability nor for any direct, indirect, or consequential damages with respect to any claim by the user or distributor of the ksu software.

@end quotation

@cdivider

@quotation

Copyright © 1995*

The President and Fellows of Harvard University

This code is derived from software contributed to Harvard by Jeremy Rassen.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@enumerate 1

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@item

All advertising materials mentioning features or use of this software must display the following acknowledgement:

@quotation

This product includes software developed by the University of California, Berkeley and its contributors.

@end quotation

@item

Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

@end enumerate

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivider

@quotation

Copyright © 2008 by the Massachusetts Institute of Technology.*

Copyright 1995 by Richard P. Basch. All Rights Reserved.*

Copyright 1995 by Lehman Brothers, Inc. All Rights Reserved.*

@quotation

Export of this software from the United States of America may require a specific license from the United States Government.

It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

@end quotation

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice

appear in supporting documentation, and that

the name of Richard P. Basch, Lehman Brothers and M.I.T. not be used in advertising or publicity pertaining to distribution of the software

without specific, written prior permission. Richard P. Basch,

Lehman Brothers and M.I.T. make no representations about the suitability of this software for any purpose. It is provided ``as is" without

express or implied warranty.

@end quotation

@cdivider

The following notice applies to `src/lib/krb5/krb/strptime.c`:

@quotation

Copyright © 1997, 1998 The NetBSD Foundation, Inc.*

All rights reserved.

This code was contributed to The NetBSD Foundation by Klaus Klein.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@enumerate 1

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary

form must reproduce the above copyright

notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@item

All advertising materials mentioning features or use of this software must display the following acknowledgement:

@quotation

This product includes software developed by the NetBSD Foundation, Inc. and its contributors.

@end quotation

@item

Neither the name of The NetBSD Foundation nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

@end enumerate

THIS SOFTWARE IS PROVIDED BY THE NETBSD FOUNDATION, INC. AND CONTRIBUTORS ``AS IS'' AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivider

The following notice applies to Unicode library files in

@code{src/lib/krb5/unicode}:

@quotation

Copyright 1997, 1998, 1999 Computing Research Labs, @*

New Mexico State University

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the ``Software''), to deal in the Software without restriction, including without limitation

the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED ``AS IS'', WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE COMPUTING RESEARCH LAB OR NEW MEXICO STATE UNIVERSITY BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

@end quotation

@cdivider

The following notice applies to @code{src/util/support/strcpy.c}:

@quotation

Copyright @copyright{ } 1998 Todd C. Miller <Todd.Miller@@courtesan.com>

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED ``AS IS'' AND THE AUTHOR DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

@end quotation

@cdivider

The following notice applies to @code{src/util/profile/argv_parse.c} and @code{src/util/profile/argv_parse.h}:

@quotation

Copyright 1999 by Theodore Ts'o.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that

the above copyright notice and this permission notice appear in all copies. THE SOFTWARE IS PROVIDED ``AS IS" AND THEODORE TS'O (THE AUTHOR) DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE. (Isn't it sick that the U.S. culture of lawsuit-happy lawyers requires this kind of disclaimer?)

@end quotation

@cdivider

The following notice applies to SWIG-generated code in
@code{src/util/profile/profile_tcl.c}:

@quotation

Copyright @copyright{ } 1999-2000, The University of Chicago

This file may be freely redistributed without license or fee provided this copyright message remains intact.

@end quotation

@cdivider

The following notice applies to portions of @code{src/lib/rpc} and @code{src/include/gssrpc}:

@quotation

Copyright @copyright{ } 2000 The Regents of the University of Michigan.
All rights reserved.

Copyright @copyright{ } 2000 Dug Song <dugsong@@UMICH.EDU>.
All rights reserved, all wrongs reversed.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@enumerate 1

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@item

Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

@end enumerate

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivider

Implementations of the MD4 algorithm are subject to the following notice:

@quotation

Copyright © 1990, RSA Data Security, Inc. All rights reserved.

License to copy and use this software is granted provided that it is identified as the "RSA Data Security, Inc. MD4 Message Digest Algorithm" in all material mentioning or referencing this software or this function.

License is also granted to make and use derivative works provided that such works are identified as "derived from the RSA Data Security, Inc. MD4 Message Digest Algorithm" in all material mentioning or referencing the derived work.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this

documentation and/or software.

@end quotation

@cdivider

Implementations of the MD5 algorithm are subject to the following notice:

@quotation

Copyright © 1990, RSA Data Security, Inc. All rights reserved.

License to copy and use this software is granted provided that it is identified as the "RSA Data Security, Inc. MD5 Message-Digest Algorithm" in all material mentioning or referencing this software or this function.

License is also granted to make and use derivative works provided

that such works are identified as "derived from the RSA Data Security, Inc. MD5 Message-Digest Algorithm" in all material mentioning or referencing the derived work.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

@end quotation

@cdivider

The following notice applies to `src/lib/crypto/crypto_tests/t_mddriver.c`:

@quotation

Copyright © 1990-2, RSA Data Security, Inc. Created 1990. All rights reserved.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

@end quotation

@cdivider

Portions of @code{src/lib/krb5} are subject to the following notice:

@quotation

Copyright @copyright{ } 1994 CyberSAFE Corporation.*

Copyright 1990,1991,2007,2008 by the Massachusetts Institute of Technology.*

All Rights Reserved.

@quotation

Export of this software from the United States of America may require a specific license from the United States Government.

It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

@end quotation

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of M.I.T. not be used in advertising or publicity pertaining to

distribution of the software without specific, written prior permission. Furthermore if you modify this software you must label your software as modified software and not distribute it in such a fashion that it might be confused with the original M.I.T. software.

Neither M.I.T., the Open Computing Security Group, nor CyberSAFE Corporation make any representations about the suitability of this software for any purpose. It is provided ``as is" without express or implied warranty.

@end quotation

@cdivider

Portions contributed by PADL Software are subject to the following license:

@quotation

Copyright (c) 2011, PADL Software Pty Ltd.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

3. Neither the name of PADL Software nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY PADL SOFTWARE AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL PADL SOFTWARE OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@end quotation

@cdivider

The bundled libev source code is subject to the following license:

@quotation

All files in libev are Copyright (C)2007,2008,2009 Marc Alexander Lehmann.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

@itemize

@item

Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

@item

Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

@end itemize

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT

LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Alternatively, the contents of this package may be used under the terms of the GNU General Public License ("GPL") version 2 or any later version, in which case the provisions of the GPL are applicable instead of the above. If you wish to allow the use of your version of this package only under the terms of the GPL and not to allow others to use your version of this file under the BSD license, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the GPL in this and the other files of this package. If you do not delete the provisions above, a recipient may use your version of this file under either the BSD or the GPL.

@end quotation

@iftex

@pagealignmacro

@endgroup

@end iftex

\input texinfo

@settitle Copyright and Other Legal Notices

@paragraphindent 0

@exampleindent 2

@documentencoding UTF-8

@node Top, , (dir), (dir)

@comment node-name, next, previous, up

@include definitions.texinfo

@include copyright.texinfo

Copyright (C) 1985-2012 by the Massachusetts Institute of Technology.

All rights reserved.

Export of software employing encryption from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that

both that copyright notice and this permission notice appear in supporting documentation, and that the name of M.I.T. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Furthermore if you modify this software you must label your software as modified software and not distribute it in such a fashion that it might be confused with the original

MIT software. M.I.T. makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

Documentation components of this software distribution are licensed under a Creative Commons Attribution-ShareAlike 3.0 Unported License. (<http://creativecommons.org/licenses/by-sa/3.0/>)

Individual source code files are copyright MIT, Cygnus Support, Novell, OpenVision Technologies, Oracle, Red Hat, Sun Microsystems, FundsXpress, and others.

Project Athena, Athena, Athena MUSE, Discuss, Hesiod, Kerberos, Moira, and Zephyr are trademarks of the Massachusetts Institute of Technology (MIT). No commercial use of these trademarks may be made without prior written permission of MIT.

"Commercial use" means use of a name in a product or other for-profit manner. It does NOT prevent a commercial firm from referring to the MIT trademarks in order to convey information (although in doing so, recognition of their trademark status should be given).

The following copyright and permission notice applies to the OpenVision Kerberos Administration system located in `kadmin/create`, `kadmin/dbutil`, `kadmin/passwd`, `kadmin/server`, `lib/kadm5`, and portions of `lib/rpc`:

Copyright, OpenVision Technologies, Inc., 1993-1996, All Rights Reserved

WARNING: Retrieving the OpenVision Kerberos Administration system source code, as described below, indicates your acceptance of the following terms. If you do not agree to the following terms, do not retrieve the OpenVision Kerberos administration system.

You may freely use and distribute the Source Code and Object Code compiled from it, with or without modification, but this Source Code is provided to you "AS IS" EXCLUSIVE OF ANY WARRANTY,

INCLUDING, WITHOUT LIMITATION, ANY WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE, OR ANY OTHER WARRANTY, WHETHER EXPRESS OR IMPLIED. IN NO EVENT WILL OPENVISION HAVE ANY LIABILITY FOR ANY LOST PROFITS, LOSS OF DATA OR COSTS OF PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES, OR FOR ANY SPECIAL, INDIRECT, OR CONSEQUENTIAL DAMAGES ARISING OUT OF THIS AGREEMENT, INCLUDING, WITHOUT LIMITATION, THOSE RESULTING FROM THE USE OF THE SOURCE CODE, OR THE FAILURE OF THE SOURCE CODE TO PERFORM, OR FOR ANY OTHER REASON.

OpenVision retains all copyrights in the donated Source Code. OpenVision also retains copyright to derivative works of the Source Code, whether created by OpenVision or by a third party. The OpenVision copyright notice must be preserved if derivative works are made based on the donated Source Code.

OpenVision Technologies, Inc. has donated this Kerberos Administration system to MIT for inclusion in the standard Kerberos 5 distribution. This donation underscores our commitment to continuing Kerberos technology development and our gratitude for the valuable work which has been performed by MIT and the Kerberos community.

Portions contributed by Matt Crawford `crawdad@fnal.gov' were work performed at Fermi National Accelerator Laboratory, which is operated by Universities Research Association, Inc., under contract DE-AC02-76CHO3000 with the U.S. Department of Energy.

Portions of `src/lib/crypto' have the following copyright:

Copyright (C) 1998 by the FundsXpress, INC.

All rights reserved.

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this

software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of FundsXpress. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. FundsXpress makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

THIS SOFTWARE IS PROVIDED "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

The implementation of the AES encryption algorithm in ``src/lib/crypto/builtin/aes'` has the following copyright:

Copyright (C) 2001, Dr
Brian Gladman `<brg@gladman.uk.net>`,
Worcester, UK.
All rights reserved.

LICENSE TERMS

The free distribution and use of this software in both source and binary form is allowed (with or without changes) provided that:

1. distributions of this source code include the above copyright notice, this list of conditions and the following disclaimer;
2. distributions in binary form include the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other associated materials;
3. the copyright holder's name is not used to endorse products built using this software without specific written permission.

DISCLAIMER

This software is provided 'as is' with no explicit or implied warranties in respect of any properties, including, but not limited to, correctness and fitness for purpose.

Portions contributed

by Red Hat, including the pre-authentication plug-in framework and the NSS crypto implementation, contain the following copyright:

Copyright (C) 2006 Red Hat, Inc.
Portions copyright (C) 2006 Massachusetts Institute of Technology
All Rights Reserved.
Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

- * Neither the name of Red Hat, Inc., nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The bundled verto source code is subject to the following license:

Copyright
2011 Red Hat, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation

files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

The implementations of GSSAPI mechglue in GSSAPI-SPNEGO in ``src/lib/gssapi'`, including the following files:

- lib/gssapi/generic/gssapi_err_generic.et
- lib/gssapi/mechglue/g_accept_sec_context.c
- lib/gssapi/mechglue/g_acquire_cred.c
- lib/gssapi/mechglue/g_canon_name.c
- lib/gssapi/mechglue/g_compare_name.c
- lib/gssapi/mechglue/g_context_time.c
- lib/gssapi/mechglue/g_delete_sec_context.c
- lib/gssapi/mechglue/g_dsp_name.c
- lib/gssapi/mechglue/g_dsp_status.c
- lib/gssapi/mechglue/g_dup_name.c
- lib/gssapi/mechglue/g_exp_sec_context.c
- lib/gssapi/mechglue/g_export_name.c
- lib/gssapi/mechglue/g_glue.c
- lib/gssapi/mechglue/g_imp_name.c
- lib/gssapi/mechglue/g_imp_sec_context.c
- lib/gssapi/mechglue/g_init_sec_context.c
- lib/gssapi/mechglue/g_initialize.c
- lib/gssapi/mechglue/g_inquire_context.c
- lib/gssapi/mechglue/g_inquire_cred.c
- lib/gssapi/mechglue/g_inquire_names.c
- lib/gssapi/mechglue/g_process_context.c
- lib/gssapi/mechglue/g_rel_buffer.c
- lib/gssapi/mechglue/g_rel_cred.c
- lib/gssapi/mechglue/g_rel_name.c

lib/gssapi/mechglue/g_rel_oid_set.c
lib/gssapi/mechglue/g_seal.c
lib/gssapi/mechglue/g_sign.c
lib/gssapi/mechglue/g_store_cred.c
lib/gssapi/mechglue/g_unseal.c
lib/gssapi/mechglue/g_userok.c
lib/gssapi/mechglue/g_utils.c
lib/gssapi/mechglue/g_verify.c
lib/gssapi/mechglue/gssd_pname_to_uid.c
lib/gssapi/mechglue/mglueP.h
lib/gssapi/mechglue/oid_ops.c
lib/gssapi/spnego/gssapiP_spnego.h
lib/gssapi/spnego/spnego_mech.c

and the initial implementation of incremental propagation, including the following new or changed files:

include/iprof_hdr.h
kadmin/server/iprofd_svc.c
lib/kdb/iprof.x
lib/kdb/kdb_convert.c
lib/kdb/kdb_log.c
lib/kdb/kdb_log.h
lib/krb5/error_tables/kdb5_err.et
slave/kpropd_rpc.c
slave/kproplog.c

are subject to the following license:

Copyright (C) 2004 Sun Microsystems, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,

WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM,
OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
DEALINGS IN THE SOFTWARE.

Kerberos V5 includes documentation and software developed at the
University of California at Berkeley, which includes this copyright
notice:

Copyright (C) 1983 Regents of the University of California.
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above
copyright notice, this list of conditions and the following
disclaimer in the documentation and/or other materials
provided with the distribution.
3. Neither the name of the University nor the names of its
contributors may be used to endorse or promote products
derived from this software without specific prior written
permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS "AS IS"
AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED
TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A
PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS
OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT
LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF
USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED
AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN
ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE

POSSIBILITY OF SUCH DAMAGE.

Portions contributed by Novell, Inc., including the LDAP database
backend, are subject to the following license:

Copyright (C) 2004-2005, Novell, Inc.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * The copyright holder's name is not used to endorse or promote products derived from this software without specific prior written permission.

THIS

SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Portions funded by Sandia National Laboratory and developed by the University of Michigan's Center for Information Technology Integration, including the PKINIT implementation, are subject to the following license:

COPYRIGHT (C) 2006-2007

THE REGENTS OF THE UNIVERSITY OF MICHIGAN
ALL RIGHTS RESERVED

Permission is granted to use, copy, create derivative works and redistribute this software and such derivative works for any purpose, so long as the name of The University of Michigan is not used in any advertising or publicity pertaining to the use of distribution of this software without specific, written prior authorization. If the above copyright notice or any other identification of the University of Michigan is included in any copy of any portion of this software, then the disclaimer below must also be included.

THIS SOFTWARE IS PROVIDED AS IS, WITHOUT REPRESENTATION FROM THE UNIVERSITY OF MICHIGAN AS TO ITS FITNESS FOR ANY PURPOSE, AND WITHOUT WARRANTY BY THE UNIVERSITY OF MICHIGAN OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING WITHOUT LIMITATION THE IMPLIED

WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE REGENTS OF THE UNIVERSITY OF MICHIGAN SHALL NOT BE LIABLE FOR ANY DAMAGES, INCLUDING SPECIAL, INDIRECT, INCIDENTAL, OR CONSEQUENTIAL DAMAGES, WITH RESPECT TO ANY CLAIM ARISING OUT OF OR IN CONNECTION WITH THE USE OF THE SOFTWARE, EVEN IF IT HAS BEEN OR IS HEREAFTER ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

The pkcs11.h file included in the PKINIT code has the following license:

Copyright 2006 g10 Code GmbH
Copyright 2006 Andreas Jellinghaus

This file is free software; as a special exception the author gives unlimited permission to copy and/or distribute it, with or without modifications, as long as this notice is preserved.

This file is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY, to the extent permitted by law; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

Portions contributed by Apple Inc. are subject to the following license:

Copyright 2004-2008 Apple Inc. All Rights Reserved.

Export of this software from the United States of America may require a specific license from the United States Government.

It is the responsibility of any person or organization

contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Apple Inc. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Apple Inc. makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

THIS SOFTWARE IS PROVIDED "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

The implementations of UTF-8 string handling in src/util/support and src/lib/krb5/unicode are subject to the following copyright and permission notice:

The OpenLDAP Public License
Version 2.8, 17 August 2003

Redistribution and use of this software and associated documentation ("Software"), with or without modification, are permitted provided that the following conditions are met:

1. Redistributions in source form must retain copyright statements and notices,
2. Redistributions in binary form must reproduce applicable copyright statements and notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution, and
3. Redistributions must contain a verbatim copy of this document.

The OpenLDAP Foundation may revise this license from time to time. Each revision is distinguished by a version number. You may use this Software under terms of this license revision or under the terms of any subsequent revision of the license.

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND ITS CONTRIBUTORS "AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OPENLDAP FOUNDATION, ITS CONTRIBUTORS, OR THE AUTHOR(S) OR OWNER(S) OF THE SOFTWARE BE LIABLE FOR ANY

DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The names of the authors and copyright holders must not be used in advertising or otherwise to promote the sale, use or other dealing in this Software without specific, written prior permission. Title to copyright in this Software shall at all times remain with copyright holders.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Copyright 1999-2003 The OpenLDAP Foundation, Redwood City, California, USA. All Rights Reserved. Permission to copy and distribute verbatim copies of this document is granted.

Marked test programs in src/lib/krb5/krb have the following copyright:

Copyright (C) 2006 Kungliga Tekniska Hgskolan
(Royal Institute of Technology, Stockholm, Sweden).
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

3. Neither the name of KTH nor the names of its contributors may be used to endorse or promote products derived from this

software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY KTH AND ITS CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL KTH OR ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Portions of the RPC implementation in `src/lib/rpc` and `src/include/gssrpc` have the following copyright and permission notice:

Copyright (C) 2010, Oracle America, Inc.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the "Oracle America, Inc." nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES,

INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 2006,2007,2009 NTT (Nippon Telegraph and Telephone Corporation). All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer as the first lines of this file unmodified.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY NTT "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL NTT BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright 2000 by Carnegie Mellon University

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Carnegie Mellon University not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS,

IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (C) 2002 Naval Research Laboratory (NRL/CCS)

Permission to use, copy, modify and distribute this software and its documentation is hereby granted, provided that both the copyright notice and this permission notice appear in all copies of the software, derivative works or modified versions, and any portions thereof.

NRL ALLOWS FREE USE OF THIS SOFTWARE IN ITS "AS IS" CONDITION AND DISCLAIMS ANY LIABILITY OF ANY KIND FOR ANY DAMAGES WHATSOEVER RESULTING FROM THE USE OF THIS SOFTWARE.

Portions
extracted from Internet RFCs have the following copyright
notice:

Copyright (C) The Internet Society (2006).

This document is subject to the rights, licenses and restrictions contained in BCP 78, and except as set forth therein, the authors retain all their rights.

This document and the information contained herein are provided on an "AS IS" basis and THE CONTRIBUTOR, THE ORGANIZATION HE/SHE

REPRESENTS OR IS SPONSORED BY (IF ANY), THE INTERNET SOCIETY AND THE INTERNET ENGINEERING TASK FORCE DISCLAIM ALL WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY WARRANTY THAT THE USE OF THE INFORMATION HEREIN WILL NOT INFRINGE ANY RIGHTS OR ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

Copyright (C) 1991, 1992, 1994 by Cygnus Support.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation. Cygnus Support makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

Copyright (C) 2006 Secure Endpoints Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Portions of the implementation of the Fortuna-like PRNG are subject to the following notice:

Copyright (C) 2005 Marko Kreen
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 1994 by the University of Southern California

EXPORT OF THIS SOFTWARE from the United States of America may require a specific license from the United States Government.

It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to copy, modify, and distribute this software and its documentation in source and binary forms is hereby granted, provided that any documentation or other materials related to such distribution or use acknowledge that the software was developed by the University of Southern California.

DISCLAIMER OF WARRANTY. THIS SOFTWARE IS PROVIDED "AS IS". The

University of Southern California MAKES NO REPRESENTATIONS OR

WARRANTIES, EXPRESS OR IMPLIED. By way of example, but not limitation, the University of Southern California MAKES NO REPRESENTATIONS OR WARRANTIES OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE. The University of Southern California shall not be held liable for any liability nor for any direct, indirect, or consequential damages with respect to any claim by the user or distributor of the ksu software.

Copyright (C) 1995

The President and Fellows of Harvard University

This code is derived from software contributed to Harvard by Jeremy Rassen.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgement:

This product includes software developed by the University of California, Berkeley and its contributors.

4. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS

BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT
LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF
USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED
AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN
ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE
POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 2008 by the Massachusetts Institute of Technology.

Copyright 1995 by Richard P. Basch. All Rights Reserved.

Copyright 1995 by Lehman Brothers, Inc. All Rights Reserved.

Export of this software from the United States of America may
require a specific license from the United States Government.

It is the responsibility of any person or organization
contemplating export to obtain such

a license before

exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and
distribute this software and its documentation for any purpose and
without fee is hereby granted, provided that the above copyright
notice appear in all copies and that both that copyright notice and
this permission notice appear in supporting documentation, and that
the name of Richard P. Basch, Lehman Brothers and M.I.T. not be
used in advertising or publicity pertaining to distribution of the
software without specific, written prior permission. Richard P.
Basch, Lehman Brothers and M.I.T. make no representations about
the suitability of this software for any purpose. It is provided
"as is" without express or implied warranty.

The following notice applies to `src/lib/krb5/krb/strptime.c':

Copyright (C) 1997, 1998 The NetBSD Foundation, Inc.

All rights reserved.

This code was contributed to The NetBSD Foundation by Klaus Klein.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright

notice, this list of conditions and the following disclaimer.

2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

3. All advertising materials mentioning features or use of this software must display the following acknowledgement:

This product includes software developed by the NetBSD Foundation, Inc. and its contributors.

4. Neither the name of The NetBSD Foundation nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE NETBSD FOUNDATION, INC. AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The following notice applies
to Unicode library files in
'src/lib/krb5/unicode':

Copyright 1997, 1998, 1999 Computing Research Labs,
New Mexico State University

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is

furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE COMPUTING RESEARCH LAB OR NEW MEXICO STATE UNIVERSITY BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

The following notice applies to `src/util/support/strncpy.c`:

Copyright (C) 1998 Todd C. Miller <Todd.Miller@courtesan.com>

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND THE AUTHOR DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

The following notice applies to `src/util/profile/argv_parse.c` and `src/util/profile/argv_parse.h`:

Copyright 1999 by Theodore Ts'o.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies. THE SOFTWARE IS PROVIDED "AS IS" AND THEODORE TS'O (THE AUTHOR) DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE,

INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS.
IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT,
INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER
RESULTING FROM LOSS OF USE, DATA
OR PROFITS, WHETHER IN AN ACTION
OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR
IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE. (Isn't
it sick that the U.S. culture of lawsuit-happy lawyers requires
this kind of disclaimer?)

The following notice applies to SWIG-generated code in
'src/util/profile/profile_tcl.c':

Copyright (C) 1999-2000, The University of Chicago

This file may be freely redistributed without license or fee
provided this copyright message remains intact.

The following notice applies to portions of 'src/lib/rpc' and
'src/include/gssrpc':

Copyright (C) 2000 The Regents of the University of Michigan. All
rights reserved.

Copyright (C) 2000 Dug Song <dugsong@UMICH.EDU>. All rights
reserved, all wrongs reversed.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above
copyright notice, this list of conditions and the following
disclaimer in the documentation and/or other materials
provided with the distribution.
3. Neither the name of the University nor the names of its
contributors may be used to endorse or promote products
derived from this software without specific prior written
permission.

THIS SOFTWARE IS PROVIDED "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Implementations of the MD4 algorithm are subject to the following notice:

Copyright (C) 1990, RSA Data Security, Inc. All rights reserved.

License to copy and use this software is granted provided that it is identified as the "RSA Data Security, Inc. MD4 Message Digest Algorithm" in all material mentioning or referencing this software or this function.

License is also granted to make and use derivative works provided that such works are identified as "derived from the RSA Data Security, Inc. MD4 Message Digest Algorithm" in all material mentioning or referencing the derived work.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

Implementations of the MD5 algorithm are subject to the following notice:

Copyright (C) 1990, RSA Data Security, Inc. All rights reserved.

License to copy and use this software is granted provided that it is identified as the "RSA Data Security, Inc. MD5 Message- Digest Algorithm" in all material mentioning or referencing this software or this function.

License is also granted to make and use derivative works provided that such works are identified as "derived from the RSA Data Security, Inc. MD5 Message-Digest Algorithm" in all material mentioning or referencing the derived work.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

The following notice applies to
`src/lib/crypto/crypto_tests/t_md driver.c':

Copyright (C) 1990-2, RSA Data Security, Inc. Created 1990. All rights reserved.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

Portions of `src/lib/krb5' are subject to the following notice:

Copyright (C) 1994 CyberSAFE Corporation.
Copyright 1990,1991,2007,2008 by the Massachusetts Institute of Technology.
All Rights Reserved.

Export of this software from the United States of America may require a specific license from the United States Government.
It is the responsibility of any person or organization

contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of M.I.T. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Furthermore if you modify this software you must label your software as modified software and not distribute it in such a fashion that it might be confused with the original M.I.T. software. Neither M.I.T., the Open Computing Security Group, nor CyberSAFE Corporation make any representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

Portions contributed by PADL Software are subject to the following license:

Copyright (c) 2011, PADL Software Pty Ltd. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of PADL Software nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY PADL SOFTWARE AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL PADL SOFTWARE OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

DAMAGES

(INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The bundled libev source code is subject to the following license:

All files in libev are Copyright (C)2007,2008,2009 Marc Alexander Lehmann.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

- * Redistributions in binary form must reproduce the above copyright

notice, this list of conditions and the following

disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Alternatively, the contents of this package may be used under the terms of the GNU General Public License ("GPL") version 2 or any later version, in which case the provisions of the GPL are applicable instead of the above. If you wish to allow the use of your version of this package only under the terms of the GPL and not to allow others to use your version of this file under the BSD

license, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the GPL in this and the other files of this package. If you do not delete the provisions above, a recipient may use your version of this file under either the BSD or the GPL.

1.154 rpm 4.8.0-32.el6

1.154.1 Available under license :

RPM and it's source code are covered under two separate licenses.

The entire code base may be distributed under the terms of the GNU General Public License (GPL), which appears immediately below. Alternatively, all of the source code in the lib subdirectory of the RPM source code distribution as well as any code derived from that code may instead be distributed under the GNU Library General Public License (LGPL), at the choice of the distributor. The complete text of the LGPL appears at the bottom of this file.

This alternatively is allowed to enable applications to be linked against the RPM library (commonly called librpm) without forcing such applications to be distributed under the GPL.

Any questions regarding the licensing of RPM should be addressed to marc@redhat.com and ewt@redhat.com.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to

your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General

Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this

License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections

when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means

the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not

excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only

way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions

either of that version or of any later version published by the Free

Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General

Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them

these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU

software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public

License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free

libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for

writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library,

and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not

compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference

directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on

the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would

not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these,

write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.155 xz 4.999.9-0.3.beta.20091007git.el6

1.155.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public

License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively

when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer

to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to

this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it

free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

XZ Utils Licensing

=====

Different licenses apply to different files in this package. Here is a rough summary of which licenses apply to which parts of this package (but check the individual files to be sure!):

- liblzma is in the public domain.

- xz, xzdec, and lzmadec command line tools are in the public domain unless GNU getopt_long had to be compiled and linked in from the lib directory. The getopt_long code is under GNU LGPLv2.1+.

- The scripts to grep, diff, and view compressed files have been adapted from gzip. These scripts and their documentation are under GNU GPLv2+.

- All the documentation in the doc directory and most of the XZ Utils specific documentation files in other directories are in the public domain.

- Translated messages are in the public domain.

- The build system contains public domain files, and files that are under GNU GPLv2+ or GNU GPLv3+. None of these files end up in the binaries being built.

- Test files and test code in the tests directory, and debugging utilities in the debug directory are in the public domain.

- The extra directory may contain public domain files, and files that are under various free software licenses.

You can do whatever you want with the files that have been put into the public domain. If you find public domain legally problematic, take the previous sentence as a license grant. If you still find the lack of copyright legally problematic, you have too many

lawyers.

As usual, this software is provided "as is", without any warranty.

If you copy significant amounts of public domain code from XZ Utils into your project, acknowledging this somewhere in your software is polite (especially if it is proprietary, non-free software), but naturally it is not legally required. Here is an example of a good notice to put into "about box" or into documentation:

This software includes code from XZ Utils <<http://tukaani.org/xz/>>.

The following license texts are included in the following files:

- COPYING.LGPLv2.1: GNU Lesser General Public License version 2.1
- COPYING.GPLv2: GNU General Public License version 2
- COPYING.GPLv3: GNU General Public License version 3

Note that the toolchain (compiler, linker etc.) may add some code pieces that are copyrighted. Thus, it is possible that e.g. liblzma binary wouldn't actually be in the public domain in its entirety even though it contains no copyrighted code from the XZ Utils source package.

If you have questions, don't hesitate to ask the author(s) for more information.

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to

freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a

covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently

reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims

owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is

conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided

above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate

parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.156 sysv-init 2.87-4.dsfl6

1.156.1 Available under license :

Sysvinit is Copyright (C) 1991-2004 Miquel van Smoorenburg

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

On Debian GNU/Linux systems, the complete text of the GNU General Public License can be found in ``usr/share/common-licenses/GPL'`.

1.157 zlib 1.2.3

1.157.1 Available under license :

Boost Software License - Version 1.0 - August 17th, 2003

Permission is hereby granted, free of charge, to any person or organization obtaining a copy of the software and accompanying documentation covered by this license (the "Software") to use, reproduce, display, distribute,

execute, and transmit the Software, and to prepare derivative works of the Software, and to permit third-parties to whom the Software is furnished to do so, all subject to the following:

The copyright notices in the Software and this entire statement, including the above license grant, this restriction and the following disclaimer, must be included in all copies of the Software, in whole or in part, and all derivative works of the Software, unless such copies or derivative works are solely in the form of machine-executable object code generated by a source language processor.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS

FOR A PARTICULAR PURPOSE, TITLE AND NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS OR ANYONE DISTRIBUTING THE SOFTWARE BE LIABLE FOR ANY DAMAGES OR OTHER LIABILITY, WHETHER IN CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.158 findutils 4.4.2-6.el6

1.158.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses

are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and

modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work

for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its

content,

constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users'

Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey,

and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional

terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted

by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered

work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the

Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms,

reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <<http://www.gnu.org/licenses/>>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with

ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands

might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.159 d-bus 1.2.24-7.el6_3

1.159.1 Available under license :

D-Bus is licensed to you under your choice of the Academic Free License version 2.1, or the GNU General Public License version 2 (or, at your option any later version).

Both licenses are included here. Some of the standalone binaries are under the GPL only; in particular, but not limited to, tools/dbus-cleanup-sockets.c and test/decode-gcov.c. Each source code file is marked with the proper copyright information - if you find a file that isn't marked please bring it to our attention.

The Academic Free License
v. 2.1

This Academic Free License (the "License") applies to any original work of authorship (the "Original Work") whose owner (the "Licensor") has placed the following notice immediately following the copyright notice for the Original Work:

Licensed under the Academic Free License version 2.1

- 1) Grant of Copyright License. Licensor hereby grants You a world-wide, royalty-free, non-exclusive, perpetual, sublicenseable license to do the following:
 - a) to reproduce the Original Work in copies;
 - b) to prepare derivative works ("Derivative Works") based upon the Original Work;
 - c) to distribute copies of the Original Work and Derivative Works to the public;

d) to perform the Original Work publicly; and

e) to display the Original Work publicly.

2) Grant of Patent License. Licensor hereby grants You a world-wide, royalty-free, non-exclusive, perpetual, sublicenseable license, under patent claims owned or controlled by the Licensor that are embodied in the Original Work as furnished by the Licensor, to make, use, sell and offer for sale the Original Work and Derivative Works.

3) Grant of Source Code License. The term "Source Code" means the preferred form of the Original Work for making modifications to it and all available documentation describing how to modify the Original Work. Licensor hereby agrees to provide a machine-readable copy of the Source Code of the Original Work along with each copy of the Original Work that Licensor distributes. Licensor reserves the right to satisfy this obligation by placing a machine-readable copy of the Source Code in an information repository reasonably calculated to permit inexpensive and convenient access by You for as long as Licensor continues to distribute the Original Work, and by publishing the address of that information repository in a notice immediately following the copyright notice that applies to the Original Work.

4) Exclusions From License Grant. Neither the names of Licensor, nor the names of any contributors to the Original Work, nor any of their trademarks or service marks, may be used to endorse or promote products derived from this Original Work without express prior written permission of the Licensor. Nothing in this License shall be deemed to grant any rights to trademarks, copyrights, patents, trade secrets or any other intellectual property of Licensor except as expressly stated herein. No patent license is granted to make, use, sell or offer to sell embodiments of any patent claims other than the licensed claims defined in Section 2. No right is granted to the trademarks of Licensor even if such marks are included in the Original Work. Nothing in this License shall be interpreted to prohibit Licensor from licensing under different terms from this License any Original Work that Licensor otherwise would have a right to license.

5) This section intentionally omitted.

6) Attribution Rights. You must retain, in the Source Code of any Derivative Works that You create, all copyright, patent or trademark notices from the Source Code of the Original Work, as well as any notices of licensing and any descriptive text identified therein as an "Attribution Notice." You must cause the Source Code for any

Derivative Works that You create to carry a prominent Attribution Notice reasonably calculated to inform recipients that You have modified the Original Work.

7) Warranty of Provenance and Disclaimer of Warranty. Licensor warrants that the copyright in and to the Original Work and the patent rights granted herein by Licensor are owned by the Licensor or are sublicensed to You under the terms of this License with the permission of the contributor(s) of those copyrights and patent rights. Except as expressly stated in the immediately preceding sentence, the Original Work is provided under this License on an "AS IS" BASIS and WITHOUT WARRANTY, either express or implied, including, without limitation, the warranties of NON-INFRINGEMENT, MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY OF THE ORIGINAL WORK IS WITH YOU. This DISCLAIMER OF WARRANTY constitutes an essential part of this License. No license to Original Work is granted hereunder except under this disclaimer.

8) Limitation of Liability. Under no circumstances and under no legal theory, whether in tort (including negligence), contract, or otherwise, shall the Licensor be liable to any person for any direct, indirect, special, incidental, or consequential damages of any character arising as a result of this License or the use of the Original Work including, without limitation, damages for loss of goodwill, work stoppage, computer failure or malfunction, or any and all other commercial damages or losses. This limitation of liability shall not apply to liability for death or personal injury resulting from Licensor's negligence to the extent applicable law prohibits such limitation. Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, so this exclusion and limitation may not apply to You.

9) Acceptance and Termination. If You distribute copies of the Original Work or a Derivative Work, You must make a reasonable effort under the circumstances to obtain the express assent of recipients to the terms of this License. Nothing else but this License (or another written agreement between Licensor and You) grants You permission to create Derivative Works based upon the Original Work or to exercise any of the rights granted in Section 1 herein, and any attempt to do so except under the terms of this License (or another written agreement between Licensor and You) is expressly prohibited by U.S. copyright law, the equivalent laws of other countries, and by international treaty. Therefore, by exercising any of the rights granted to You in Section 1 herein, You indicate Your acceptance of this License and all of its terms and conditions.

10) Termination for Patent Action. This License shall terminate automatically and You may no longer exercise any of the rights granted to You by this License as of the date You commence an action, including a cross-claim or counterclaim, against Licensor or any licensee alleging that the Original Work infringes a patent. This termination provision shall not apply for an action alleging patent infringement by combinations of the Original Work with other software or hardware.

11) Jurisdiction, Venue and Governing Law. Any action or suit relating to this

License may be brought only in the courts of a jurisdiction wherein the Licensor resides or in which Licensor conducts its primary business, and under the laws of that jurisdiction excluding its conflict-of-law provisions. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded. Any use of the Original Work outside the scope of this License or after its termination shall be subject to the requirements and penalties of the U.S. Copyright Act, 17 U.S.C. 101 et seq., the equivalent laws of other countries, and international treaty. This section shall survive the termination of this License.

12) Attorneys Fees. In any action to enforce the terms of this License or seeking damages relating thereto, the prevailing party shall be entitled to recover its costs and expenses, including, without limitation, reasonable attorneys' fees and costs incurred in connection with such action, including any appeal of such action. This section shall survive the termination of this License.

13) Miscellaneous. This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable.

14) Definition of "You" in This License. "You" throughout this License, whether in upper or lower case, means an individual or a legal entity exercising rights under, and complying with all of the terms of, this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with you. For purposes of this definition, "control" means (i) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (ii) ownership of fifty percent (50%) or more of the outstanding shares, or (iii) beneficial ownership of such entity.

15) Right to Use. You may use the Original Work in all ways not

otherwise
restricted or conditioned by this License or by law, and
Licensor promises not to interfere with or be responsible for such
uses by You.

This license is Copyright (C) 2003-2004 Lawrence E. Rosen. All rights
reserved. Permission is hereby granted to copy and distribute this
license without modification. This license may not be modified without
the express written permission of its copyright owner.

--

END OF ACADEMIC FREE LICENSE. The following is intended to describe the essential
differences between the Academic Free License (AFL) version 1.0 and other
open source licenses:

The Academic Free License is similar to the BSD, MIT, UoI/NCSA and Apache
licenses in many respects but it is intended to solve a few problems with
those licenses.

- * The AFL is written so as to make it clear what software is being
licensed (by the inclusion of a statement following the copyright notice
in the software). This way, the license functions better than a template
license. The BSD,
MIT and UoI/NCSA licenses apply to unidentified software.
- * The AFL contains a complete copyright grant to the software. The BSD
and Apache licenses are vague and incomplete in that respect.
- * The AFL contains a complete patent grant to the software. The BSD, MIT,
UoI/NCSA and Apache licenses rely on an implied patent license and contain
no explicit patent grant.
- * The AFL makes it clear that no trademark rights are granted to the
licensor's trademarks. The Apache license contains such a provision, but the
BSD, MIT and UoI/NCSA licenses do not.
- * The AFL includes the warranty by the licensor that it either owns the
copyright or that it is distributing the software under a license. None of
the other licenses contain that warranty. All other warranties are disclaimed,
as is the case for the other licenses.
- * The AFL is itself copyrighted (with the right granted to copy and distribute
without modification). This ensures that the owner of the copyright to the
license will control changes. The Apache license contains a copyright notice,
but the BSD, MIT and UoI/NCSA licenses do not.

--

START OF GNU GENERAL PUBLIC LICENSE

--

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not

signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program),

you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License

and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through

that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR

REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software;
you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by
the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details

type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.160 module-init-tools 3.9-21.el6_4

1.160.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to

your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed

under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this

License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not

excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free

Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,

or

(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may

consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.161 selinux 2.0.94-5.3.el6_4.1

1.161.1 Available under license :

This library (libselenium) is public domain software, i.e. not copyrighted.

Warranty Exclusion

You agree that this software is a non-commercially developed program that may contain "bugs" (as that term is used in the industry) and that it may not function as intended. The software is licensed "as is". NSA makes no, and hereby expressly disclaims all, warranties, express, implied, statutory, or otherwise with respect to the software, including noninfringement and the implied warranties of merchantability and fitness for a particular purpose.

Limitation of Liability

In no event will NSA be liable for any damages, including loss of data, lost profits, cost of cover, or other special, incidental, consequential, direct or indirect damages arising from the software or the use thereof, however caused and on any theory of liability. This limitation will apply even if NSA has been advised of the possibility of such damage. You acknowledge that this is a reasonable allocation of risk.

1.162 pciutils 3.1.4

1.162.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free

software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such

interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is

allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
```

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.163 nss 3.14.3-4.el6_4

1.163.1 Available under license :

NSS is available under the Mozilla Public License, version 2, a copy of which is below.

Note on GPL Compatibility

The MPL 2, section 3.3, permits you to combine NSS with code under the GNU General Public License (GPL) version 2, or any later version of that license, to make a Larger Work, and distribute the result under the GPL. The only condition is that you must also make NSS, and any changes you have made to it, available to recipients under the terms of the MPL 2 also.

Anyone who receives the combined code from you does not have to continue to dual licence in this way, and may, if they wish, distribute under the terms of either of the two licences - either the MPL alone or the GPL alone. However, we discourage people from distributing copies of NSS under the GPL alone, because it means that any improvements they make cannot be reincorporated into the main version of NSS. There is never a need to do this for license compatibility reasons.

Note on LGPL Compatibility

The above also applies to combining MPLed code in a single library with code under the GNU Lesser General Public License (LGPL) version 2.1, or any later version of that license. If the LGPLed code and the MPLed code are not in the same library, then the copyleft coverage of the two licences does not overlap, so no issues arise.

Mozilla Public License Version 2.0

=====

1. Definitions

1.1. "Contributor"

means each individual or legal entity that creates, contributes to the creation of, or owns Covered Software.

1.2. "Contributor Version"

means the combination of the Contributions of others (if any) used by a Contributor and that particular Contributor's Contribution.

1.3. "Contribution"

means Covered Software of a particular Contributor.

1.4. "Covered Software"

means Source Code Form to which the initial Contributor has attached the notice in Exhibit A, the Executable Form of such Source Code Form, and Modifications of such Source Code Form, in each case including portions thereof.

1.5. "Incompatible With Secondary Licenses"

means

(a) that the initial Contributor has attached the notice described in Exhibit B to the Covered Software; or

(b) that the Covered Software was made available under the terms of version 1.1 or earlier of the License, but not also under the terms of a Secondary License.

1.6. "Executable Form"

means any form of the work other than Source Code Form.

1.7. "Larger Work"

means a work that combines Covered Software with other material, in a separate file or files, that is not Covered Software.

1.8. "License"

means this document.

1.9. "Licensable"

means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently, any and all of the rights conveyed by this License.

1.10. "Modifications"

means any
of the following:

- (a) any file in Source Code Form that results from an addition to, deletion from, or modification of the contents of Covered Software; or
- (b) any new file in Source Code Form that contains any Covered Software.

1.11. "Patent Claims" of a Contributor

means any patent claim(s), including without limitation, method, process, and apparatus claims, in any patent Licensable by such Contributor that would be infringed, but for the grant of the License, by the making, using, selling, offering for sale, having made, import, or transfer of either its Contributions or its Contributor Version.

1.12. "Secondary License"

means either the GNU General Public License, Version 2.0, the GNU Lesser General Public License, Version 2.1, the GNU Affero General Public License, Version 3.0, or any later versions of those licenses.

1.13. "Source Code Form"

means the form of the work preferred for making modifications.

1.14.

"You" (or "Your")

means an individual or a legal entity exercising rights under this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. License Grants and Conditions

2.1. Grants

Each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license:

- (a) under intellectual property rights (other than patent or trademark) Licensable by such Contributor to use, reproduce, make available, modify, display, perform, distribute, and otherwise exploit its Contributions, either on an unmodified basis, with Modifications, or as

part of a Larger Work; and

- (b) under Patent Claims of such Contributor to make, use, sell, offer for sale, have made, import, and otherwise transfer either its Contributions or its Contributor Version.

2.2. Effective Date

The licenses granted in Section 2.1 with respect to any Contribution become effective for each Contribution on the date the Contributor first distributes such Contribution.

2.3. Limitations on Grant Scope

The licenses granted in this Section 2 are the only rights granted under this License. No additional rights or licenses will be implied from the distribution or licensing of Covered Software under this License. Notwithstanding Section 2.1(b) above, no patent license is granted by a Contributor:

- (a) for any code that a Contributor has removed from Covered Software; or
- (b) for infringements caused by: (i) Your and any other third party's modifications of Covered Software, or (ii) the combination of its Contributions with other software (except as part of its Contributor Version); or
- (c) under Patent Claims infringed by Covered Software in the absence of its Contributions.

This License does not grant any rights in the trademarks, service marks, or logos of any Contributor (except as may be necessary to comply with the notice requirements in Section 3.4).

2.4. Subsequent Licenses

No Contributor makes additional grants as a result of Your choice to distribute the Covered Software under a subsequent version of this License (see Section 10.2) or under the terms of a Secondary License (if permitted under the terms of Section 3.3).

2.5. Representation

Each Contributor represents that the Contributor believes its Contributions are its original creation(s) or it has sufficient rights to grant the rights to its Contributions conveyed by this License.

2.6. Fair Use

This License is not intended to limit any rights You have under applicable copyright doctrines of fair use, fair dealing, or other equivalents.

2.7. Conditions

Sections

3.1, 3.2, 3.3, and 3.4 are conditions of the licenses granted in Section 2.1.

3. Responsibilities

3.1. Distribution of Source Form

All distribution of Covered Software in Source Code Form, including any Modifications that You create or to which You contribute, must be under the terms of this License. You must inform recipients that the Source Code Form of the Covered Software is governed by the terms of this License, and how they can obtain a copy of this License. You may not attempt to alter or restrict the recipients' rights in the Source Code Form.

3.2. Distribution of Executable Form

If You distribute Covered Software in Executable Form then:

- (a) such Covered Software must also be made available in Source Code Form, as described in Section 3.1, and You must inform recipients of the Executable Form how they can obtain a copy of such Source Code Form by reasonable means in a timely manner, at a charge no more than the cost of distribution to the recipient; and
- (b) You may distribute such Executable Form under the terms of this License, or sublicense it under different terms, provided that the license for the Executable Form does not attempt to limit or alter the recipients' rights in the Source Code Form under this License.

3.3. Distribution of a Larger Work

You may create and distribute a Larger Work under terms of Your choice, provided that You also comply with the requirements of this License for the Covered Software. If the Larger Work is a combination of Covered Software with a work governed by one or more Secondary Licenses, and the

Covered Software is not Incompatible With Secondary Licenses, this License permits You to additionally distribute such Covered Software under the terms of such Secondary License(s), so that the recipient of the Larger Work may, at their option, further distribute the Covered Software under the terms of either this License or such Secondary License(s).

3.4.

Notices

You may not remove or alter the substance of any license notices (including copyright notices, patent notices, disclaimers of warranty, or limitations of liability) contained within the Source Code Form of the Covered Software, except that You may alter any license notices to the extent required to remedy known factual inaccuracies.

3.5. Application of Additional Terms

You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Software. However, You may do so only on Your own behalf, and not on behalf of any Contributor. You must make it absolutely clear that any such warranty, support, indemnity, or liability obligation is offered by You alone, and You hereby agree to indemnify every Contributor for any liability incurred by such Contributor as a result of warranty, support, indemnity or liability terms You offer. You may include additional disclaimers of warranty and limitations of liability specific to any jurisdiction.

4. Inability to Comply Due to Statute or Regulation

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Software due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be placed in a text file included with all distributions of the Covered Software under this License. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Termination

5.1. The rights granted under this License will terminate automatically if You fail to comply with any of its terms. However, if You become

compliant, then the rights granted under this License from a particular Contributor are reinstated (a) provisionally, unless and until such Contributor explicitly and finally terminates Your grants, and (b) on an ongoing basis, if such Contributor fails to notify You of the non-compliance by some reasonable means prior to 60 days after You have come back into compliance. Moreover, Your grants from a particular Contributor are reinstated on an ongoing basis if such Contributor notifies You of the non-compliance by some reasonable means, this is the first time You have received notice of non-compliance with this License from such Contributor, and You become compliant prior to 30 days after Your receipt of the notice.

5.2. If You initiate litigation against any entity by asserting a patent infringement claim (excluding declaratory judgment actions, counter-claims, and cross-claims) alleging that a Contributor Version directly or indirectly infringes any patent, then the rights granted to You by any and all Contributors for the Covered Software under Section 2.1 of this License shall terminate.

5.3. In the event of termination under Sections 5.1 or 5.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or Your distributors under this License prior to termination shall survive termination.

* * * * *

* 6. Disclaimer of Warranty *
* ----- *
* * * * *

* Covered Software is provided under this License on an "as is" *
* basis, without warranty of any kind, either expressed, implied, or *
* statutory, including, without limitation, warranties that the *
* Covered Software is free of defects, merchantable, fit for a *
* particular purpose or non-infringing. The entire *
* risk as to the *
* quality and performance of the Covered Software is with You. *
* Should any Covered Software prove defective in any respect, You *
* (not any Contributor) assume the cost of any necessary servicing, *
* repair, or correction. This disclaimer of warranty constitutes an *
* essential part of this License. No use of any Covered Software is *
* authorized under this License except under this disclaimer. *
* * * * *

* * * * *

* 7. Limitation of Liability *

* ----- *

* *

* Under no circumstances

and under no legal theory, whether tort *

* (including negligence), contract, or otherwise, shall any *

* Contributor, or anyone who distributes Covered Software as *

* permitted above, be liable to You for any direct, indirect, *

* special, incidental, or consequential damages of any character *

* including, without limitation, damages for lost profits, loss of *

* goodwill, work stoppage, computer failure or malfunction, or any *

* and all other commercial damages or losses, even if such party *

* shall have been informed of the possibility of such damages. This *

* limitation of liability shall not apply to liability for death or *

* personal injury resulting from such party's negligence to the *

* extent applicable law prohibits such limitation. Some *

* jurisdictions do not allow the exclusion or limitation of *

* incidental or consequential damages, so this exclusion and *

* *

limitation may not apply to You. *

* *

8. Litigation

Any litigation relating to this License may be brought only in the courts of a jurisdiction where the defendant maintains its principal place of business and such litigation shall be governed by laws of that jurisdiction, without reference to its conflict-of-law provisions. Nothing in this Section shall prevent a party's ability to bring cross-claims or counter-claims.

9. Miscellaneous

This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not be used to construe this License against a Contributor.

10. Versions of the License

10.1. New Versions

Mozilla Foundation is the license steward. Except as provided in Section 10.3, no one other than the license steward has the right to modify or publish new versions of this License. Each version will be given a distinguishing version number.

10.2. Effect of New Versions

You may distribute the Covered Software under the terms of the version of the License under which You originally received the Covered Software, or under the terms of any subsequent version published by the license steward.

10.3. Modified Versions

If you create software not governed by this License, and you want to create a new license for such software, you may create and use a modified version of this License if you rename the license and remove any references to the name of the license steward (except to note that such modified license differs from this License).

10.4. Distributing

Source Code Form that is Incompatible With Secondary Licenses

If You choose to distribute Source Code Form that is Incompatible With Secondary Licenses under the terms of this version of the License, the notice described in Exhibit B of this License must be attached.

Exhibit A - Source Code Form License Notice

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

If it is not possible or desirable to put the notice in a particular file, then You may include the notice in a location (such as a LICENSE file in a relevant directory) where a recipient would be likely to look for such a notice.

You may add additional accurate notices of copyright ownership.

Exhibit B - "Incompatible With Secondary Licenses" Notice

This Source Code Form

is "Incompatible With Secondary Licenses", as defined by the Mozilla Public License, v. 2.0.

***** BEGIN LICENSE BLOCK *****

Version: MPL 1.1/GPL 2.0/LGPL 2.1

The contents of this file are subject to the Mozilla Public License Version 1.1 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <http://www.mozilla.org/MPL/>

Software distributed under the License is distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License for the specific language governing rights and limitations under the License.

The Original Code is the Netscape security libraries.

The Initial Developer of the Original Code is Netscape Communications Corporation. Portions created by Netscape are Copyright (C) 1994-2000 Netscape Communications Corporation. All Rights Reserved.

Contributor(s):

Alternatively, the contents of this file may be used under the terms of either the GNU General Public License Version 2 or later (the "GPL"), or the GNU Lesser General Public License Version 2.1 or later (the "LGPL"), in which case the provisions of the GPL or the LGPL are applicable instead of those above. If you wish to allow use of your version of this file only under the terms of either the GPL or the LGPL, and not to allow others to use your version of this file under the terms of the MPL, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the GPL or the LGPL. If you do not delete the provisions above, a recipient may use your version of this file under the terms of any one of the MPL, the GPL or the LGPL.

***** END LICENSE BLOCK *****

Within this directory, each of the file listed below is licensed under the terms given in the file LICENSE-MPL, also in this directory.

PRIMES

Copyright 2005 Sun Microsystems, Inc. All rights reserved.

Use is subject to license terms.

***** BEGIN LICENSE BLOCK *****

Version: MPL 1.1/GPL 2.0/LGPL 2.1

The contents of this package are subject to the Mozilla Public License Version 1.1 (the "License"); you may not use this package except in compliance with the License. You may obtain a copy of the License at <http://www.mozilla.org/MPL/>

Software distributed under the License is distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License for the specific language governing rights and limitations under the License.

The Original Code is the Netscape Portable Runtime (NSPR).

The Initial Developer of the Original Code is Netscape Communications Corporation. Portions created by the Initial Developer are Copyright (C) 1998-2000 the Initial Developer. All Rights Reserved.

Contributor(s):

Alternatively, the contents of this file may be used under the terms of either the GNU General Public License Version 2 or later (the "GPL"), or the GNU Lesser General Public License Version 2.1 or later (the "LGPL"), in which case the provisions of the GPL or the LGPL are applicable instead of those above. If you wish to allow use of your version of this file only under the terms of either the GPL or the LGPL, and not to allow others to use your version of this file under the terms of the MPL, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the GPL or the LGPL. If you do not delete the provisions above, a recipient may use your version of this file under the terms of any one of the MPL, the GPL or the LGPL.

***** END LICENSE BLOCK *****

Within this directory, each of the file listed below is licensed under the terms given in the file LICENSE-MPL, also in this directory.

basecv.t.pod
gcd.pod
invmod.pod
isprime.pod
lap.pod
mpi-test.pod
prime.txt
prng.pod

Within this directory, each of the file listed below is licensed under the terms given in the file LICENSE-MPL, also in this directory.

pi1k.txt

pi2k.txt
pi5k.txt

1.164 grep 2.6.3-3.el6

1.164.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for
software and other kinds of works.

The licenses for most software and other practical works are designed
to take away your freedom to share and change the works. By contrast,
the GNU General Public License is intended to guarantee your freedom to
share and change all versions of a program--to make sure it remains free
software for all its users. We, the Free Software Foundation, use the
GNU General Public License for most of our software; it applies also to
any other work released this way by its authors. You can apply it to
your programs, too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses
are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
them if you wish), that you receive source code or can get it if you
want it, that you can change the software or use pieces of it in new
free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you
these rights or asking you to surrender the rights. Therefore, you have
certain responsibilities if you distribute copies of the software, or if
you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether
gratis or for a fee, you must pass on to the recipients the same
freedoms that you received. You must make sure that they, too, receive
or can get the source code. And you must show them these terms so they
know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component

(kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under

the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the

Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place

additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the

form of a separately written license, or stated as exceptions;
the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time

you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent

(such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different

permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively

state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <<http://www.gnu.org/licenses/>>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

1.165 elfutils 0.152-1.el6

1.165.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and

you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program
(or a work based on it,
under Section 2) in object code or executable form under the terms of
Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable
source code, which must be distributed under the terms of Sections
1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three
years, to give any third party, for a charge no more than your
cost of physically performing source distribution, a complete
machine-readable copy of the corresponding source code, to be
distributed under the terms of Sections 1 and 2 above on a medium
customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer
to distribute corresponding source code. (This alternative is
allowed only for noncommercial distribution and only if you
received the program
in object code or executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for
making modifications to it. For an executable work, complete source
code means all the source code for all modules it contains, plus any
associated interface definition files, plus the scripts used to
control compilation and installation of the executable. However, as a
special exception, the source code distributed need not include
anything that is normally distributed (in either source or binary
form) with the major components (compiler, kernel, and so on) of the
operating system on which the executable runs, unless that component
itself accompanies the executable.

If distribution of executable or object code is made by offering
access to copy from a designated place, then offering equivalent
access to copy the source code from the same place counts as
distribution of the source code, even though third parties are not
compelled
to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program
except as expressly provided under this License. Any attempt
otherwise to copy, modify, sublicense or distribute the Program is
void, and will automatically terminate your rights under this License.
However, parties who have received copies, or rights, from you under
this License will not have their licenses terminated so long as such
parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute

software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands

`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.166 glibc 2.12-1.107.el6_4.2

1.166.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change

free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library

General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must

be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not

signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to

be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY

AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year>  
<name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if

necessary. Here
is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the
library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!
Copyright 1992, 1993, 1994, 1997 Henry Spencer. All rights reserved.
This software is not subject to any license of the American Telephone
and Telegraph Company or of the Regents of the University of California.

Permission is granted to anyone to use this software for any purpose on
any computer system, and to alter it and redistribute it, subject
to the following restrictions:

1. The author is not responsible for the consequences of use of this
software, no matter how awful, even if they arise from flaws in it.
2. The origin of this software must not be misrepresented, either by
explicit claim or by omission. Since few users ever read sources,
credits must appear in the documentation.
3. Altered versions must be plainly marked as such, and must not be
misrepresented as being the original software. Since few users
ever read sources, credits must appear in the documentation.
4. This notice may not be removed or altered.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to
using it. (Some other Free Software Foundation software is covered by
the GNU Library General Public License instead.) You can apply it to

your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed

under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this

License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not

excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free

Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may

consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

@appendix GNU Free Documentation License

@cindex FDL, GNU Free Documentation License

@center Version 1.1, March 2000

@display

Copyright © 2000 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other written document *free* in the sense of freedom: to assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of "copyleft", which means that derivative works of the document must themselves be free in the same sense. It complements the GNU

General Public License, which is a copyleft license designed for free software.

We have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work that contains a notice placed by the copyright holder saying it can be distributed

under the terms of this License. The ``Document'', below, refers to any such manual or work. Any member of the public is a licensee, and is addressed as ``you''.

A ``Modified Version'' of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A ``Secondary Section'' is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (For example, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The ``Invariant Sections'' are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License.

The ``Cover Texts'' are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License.

A ``Transparent'' copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, whose contents can be viewed and edited directly and straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup has been designed to thwart or discourage subsequent modification by readers is not Transparent. A copy that is not ``Transparent'' is called ``Opaque''.

Examples of suitable formats for Transparent copies include plain `@sc{ascii}` without markup, Texinfo input format, `La@TeX{}` input format, `@acronym{SGML}` or `@acronym{XML}` using a publicly available `@acronym{DTD}`, and standard-conforming simple `@acronym{HTML}` designed for human modification. Opaque formats include PostScript, `@acronym{PDF}`, proprietary formats that can be read and edited only by

proprietary word processors, @acronym{SGML} or @acronym{XML} for which the @acronym{DTD} and/or processing tools are not generally available, and the machine-generated @acronym{HTML} produced by some word processors for output purposes only.

The ``Title Page'' means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, ``Title Page'' means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies of the Document numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies.

The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition. Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent

pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a publicly-accessible computer-network location containing a complete Transparent copy of the Document, free of added material, which the general network-using public has access to download anonymously at no charge using public-standard network protocols. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has less than five).

@item

State on the Title page the name of the publisher of the

Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section entitled ``History'', and its title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section.

You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

In any section entitled ``Acknowledgments'' or ``Dedications'', preserve the section's title, and preserve in the section all the substance and tone of each of the contributor acknowledgments and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section entitled ``Endorsements''. Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section as ``Endorsements'' or to conflict in title with any Invariant Section.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section entitled ``Endorsements'', provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the

Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections entitled ``History'' in the various original documents, forming one section entitled ``History''; likewise combine any sections entitled ``Acknowledgments'', and any sections entitled ``Dedications''. You must delete all sections entitled ``Endorsements.''

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, does not as a whole count as a Modified Version of the Document, provided no compilation copyright is claimed for the compilation. Such a compilation is called an ``aggregate'', and this License does not apply to the other self-contained works thus compiled with the Document, on account of their being thus compiled, if they are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these

copies of the Document, then if the Document is less than one quarter of the entire aggregate, the Document's Cover Texts may be placed on covers that surround only the Document within the aggregate. Otherwise they must appear on covers around the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License provided that you also include the original English version of this License. In case of a disagreement between the translation and the original English version of this License, the original English version will prevail.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided for under this License. Any other attempt to copy, modify, sublicense or distribute the Document is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See [@uref{http://www.gnu.org/copyleft/}](http://www.gnu.org/copyleft/).

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document

does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation.
@end enumerate

@page
@appendixsubsec ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

```
@smallexample
@group
Copyright (C) @var{year} @var{your name}.
Permission is granted to copy, distribute and/or modify this document
under the terms of the GNU Free Documentation License, Version 1.1
or any later version published by the Free Software Foundation;
with the Invariant Sections being @var{list their titles}, with the
Front-Cover Texts being @var{list}, and with the Back-Cover Texts being @var{list}.
A copy of the license is included in the section entitled ``GNU
Free Documentation License".
@end group
@end smallexample
```

If you have no Invariant Sections, write ``with no Invariant Sections" instead of saying which ones are invariant. If you have no Front-Cover Texts, write ``no Front-Cover Texts" instead of ``Front-Cover Texts being @var{list}"; likewise for Back-Cover Texts.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

```
@c Local Variables:
@c ispell-local-pdict: "ispell-dict"
@c End:
```

This file contains the copying permission notices for various files in the GNU C Library distribution that have copyright owners other than the Free Software Foundation. These notices all require that a copy of the notice be included in the accompanying documentation and be distributed with binary distributions of the code, so be sure to include this file along with any binary distributions derived from the GNU C Library.

All code incorporated from 4.4 BSD is distributed under the following

license:

Copyright (C) 1991 Regents of the University of California.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. [This condition was removed.]
4. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The DNS resolver code, taken from BIND 4.9.5, is copyrighted both by UC Berkeley and by Digital Equipment Corporation. The DEC portions are under the following license:

Portions Copyright (C) 1993 by Digital Equipment Corporation.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies, and that the name of Digital Equipment Corporation not be used in advertising or publicity pertaining to distribution of the document or software without specific, written prior permission.

THE SOFTWARE IS PROVIDED ``AS IS" AND DIGITAL EQUIPMENT CORP. DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL

IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL DIGITAL EQUIPMENT CORPORATION BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

The Sun RPC support (from rpcsrc-4.0) is covered by the following license:

Copyright (C) 1984, Sun Microsystems, Inc.

Sun RPC is a product of Sun Microsystems, Inc. and is provided for unrestricted use provided that this legend is included on all tape media and as a part of the software program in whole or part. Users may copy or modify Sun RPC without charge, but are not authorized to license or distribute it to anyone else except as part of a product or program developed by the user.

SUN RPC IS PROVIDED AS IS WITH NO WARRANTIES OF ANY KIND INCLUDING THE WARRANTIES OF DESIGN, MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, OR ARISING FROM A COURSE OF DEALING, USAGE OR TRADE PRACTICE.

Sun RPC is provided with no support and without any obligation on the part of Sun Microsystems, Inc. to assist in its use, correction, modification or enhancement.

SUN MICROSYSTEMS, INC. SHALL HAVE NO LIABILITY WITH RESPECT TO THE INFRINGEMENT OF COPYRIGHTS, TRADE SECRETS OR ANY PATENTS BY SUN RPC OR ANY PART THEREOF.

In no event will Sun Microsystems, Inc. be liable for any lost revenue or profits or other special, indirect and consequential damages, even if Sun has been advised of the possibility of such damages.

The following CMU license covers some of the support code for Mach, derived from Mach 3.0:

Mach Operating System
Copyright (C) 1991,1990,1989 Carnegie Mellon University
All Rights Reserved.

Permission to use, copy, modify and distribute this software and its documentation is hereby granted, provided that both the copyright notice and this permission notice appear in all copies of the

software, derivative works or modified versions, and any portions thereof, and that both notices appear in supporting documentation.

CARNEGIE MELLON ALLOWS FREE USE OF THIS SOFTWARE
IN ITS ``AS IS"

CONDITION. CARNEGIE MELLON DISCLAIMS ANY LIABILITY OF ANY KIND FOR ANY DAMAGES WHATSOEVER RESULTING FROM THE USE OF THIS SOFTWARE.

Carnegie Mellon requests users of this software to return to

Software Distribution Coordinator
School of Computer Science
Carnegie Mellon University
Pittsburgh PA 15213-3890

or Software.Distribution@CS.CMU.EDU any improvements or extensions that they make and grant Carnegie Mellon the rights to redistribute these changes.

The file `if_ppp.h` is under the following CMU license:

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY CARNEGIE MELLON UNIVERSITY AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE UNIVERSITY OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The following

license covers the files from Intel's "Highly Optimized Mathematical Functions for Itanium" collection:

Intel License Agreement

Copyright (c) 2000, Intel Corporation

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * The name of Intel Corporation may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL INTEL OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The files inet/getnameinfo.c and sysdeps/posix/getaddrinfo.c are copyright (C) by Craig Metz and are distributed under the following license:

/* The Inner Net License, Version 2.00

The author(s) grant permission for redistribution and use in source and binary forms, with or without modification, of the software and documentation provided that the following conditions are met:

0. If you receive a version of the software that

is specifically labelled

as not being for redistribution (check the version message and/or README), you are not permitted to redistribute that version of the software in any way or form.

1. All terms of the all other applicable copyrights and licenses must be followed.
2. Redistributions of source code must retain the authors' copyright notice(s), this list of conditions, and the following disclaimer.
3. Redistributions in binary form must reproduce the authors' copyright notice(s), this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
4. [The copyright holder has authorized the removal of this clause.]
5. Neither the name(s) of the author(s) nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY ITS AUTHORS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED

WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHORS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

If these license terms cause you a real problem, contact the author. */

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that

any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact

all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.
^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a)

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that

uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on

the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.
- b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent

license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free

programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library.

It is safest to attach them to the start of each source file to most

effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full

notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or
modify it under the terms of the GNU Lesser General Public
License as published by the Free Software Foundation; either
version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public
License along with this library; if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston,
MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or
your school, if any, to sign a "copyright disclaimer" for the library,
if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the
library `Frob' (a library for tweaking knobs) written by James
Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.167 berkeley-db 4.7.25-17.el6

1.167.1 Available under license :

```
/*-  
 * $Id: LICENSE,v 12.9 2008/02/07 17:12:17 mark Exp $  
 */
```

The following is the license that applies to this copy of the Berkeley DB
software. For a license to use the Berkeley DB software under conditions
other than those described here, or to purchase support for this software,
please contact Oracle at berkeleydb-info_us@oracle.com.

/*

* Copyright (c) 1990,2008 Oracle. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:

- * 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
- * 3. Redistributions in any form must
be accompanied by information on
* how to obtain complete source code for the DB software and any
* accompanying software that uses the DB software. The source code
* must either be included in the distribution or be available for no
* more than the cost of distribution plus a nominal fee, and must be
* freely redistributable under reasonable conditions. For an
* executable file, complete source code means the source code for all
* modules it contains. It does not include source code for modules or
* files that typically accompany the major components of the operating
* system on which the executable file runs.

*

* THIS SOFTWARE IS PROVIDED BY ORACLE ``AS IS" AND ANY EXPRESS OR
* IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED
* WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, OR
* NON-INFRINGEMENT, ARE DISCLAIMED. IN NO EVENT SHALL ORACLE BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY,

OR

* CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF
* SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR
* BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
* WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE
* OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN
* IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

*/

/*

* Copyright (c) 1990, 1993, 1994, 1995

* The Regents of the University of California. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:

- * 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the
* documentation and/or other
materials provided with the distribution.

* 3. Neither the name of the University nor the names of its contributors
* may be used to endorse or promote products derived from this software
* without specific prior written permission.

*
* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY
OF
* SUCH DAMAGE.

*/
/*

* Copyright (c) 1995, 1996
* The President and Fellows of Harvard University. All rights reserved.

*
* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:

- * 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
- * 3. Neither the name of the University nor the names of its contributors
* may be used to endorse or promote products derived from this software
* without specific prior written permission.

*
* THIS SOFTWARE IS PROVIDED BY HARVARD AND ITS CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED
WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL HARVARD OR ITS CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.

*/

/**

* ASM: a very small and fast Java bytecode manipulation framework

* Copyright (c) 2000-2005 INRIA, France Telecom

* All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source

code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. Neither the name of the copyright holders nor the names of its

* contributors may be used to endorse or promote products derived from

* this software without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS"

* AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE

* LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR

* CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF

* SUBSTITUTE

GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS

* INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN

* CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)

* ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF

* THE POSSIBILITY OF SUCH DAMAGE.

*/

1.168 gawk 3.1.7-10.el6

1.168.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor,

Boston, MA 02110-1301, USA.

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS

AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program).

Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third

parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium

customarily used for software interchange; or,

- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to

these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions

of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```


<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave

you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this

function must

be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the

Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a

medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not

excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute

the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a

license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is

safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we

stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding

Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately
publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not

used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years

and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is

available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates

for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or

authors of the material; or

e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is

reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright

holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that

any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or

arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License,

section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE

USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <<http://www.gnu.org/licenses/>>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.169 tzdata 2013c-2.el6

1.169.1 Available under license :

No license file was found, but licenses were detected in source scan.

: 'This file is in the public domain, so clarified as of'

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/yearistype.sh
```

No license file was found, but licenses were detected in source scan.

```
# <pre>
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.
#
# TZ zone descriptions
#
# From Paul Eggert (1996-08-05):
#
# This file contains a table with the following columns:
```

```

# 1. ISO 3166 2-character country code. See the file `iso3166.tab'.
# 2. Latitude and longitude of the zone's principal location
#   in ISO 6709 sign-degrees-minutes-seconds format,
#   either +-DDMM+-DDDMM or +-DDMMSS+-DDDMMSS,
#   first latitude (+ is north), then longitude (+ is east).
# 3. Zone name used in value of TZ environment variable.
# 4. Comments; present if and only if the country has multiple rows.
#
# Columns are separated by a single tab.
# The table is sorted first by country, then an order within the country that
# (1) makes some geographical sense, and
# (2) puts the most populous zones first, where that does not contradict (1).
#
# Lines beginning with `#' are comments.
#
#country-
#code coordinates TZ  comments
AD +4230+00131 Europe/Andorra
AE +2518+05518 Asia/Dubai
AF +3431+06912 Asia/Kabul
AG +1703-06148 America/Antigua
AI +1812-06304 America/Anguilla
AL +4120+01950 Europe/Tirane
AM +4011+04430 Asia/Yerevan
AO -0848+01314 Africa/Luanda
AQ -7750+16636 Antarctica/McMurdo McMurdo
Station, Ross Island
AQ -9000+00000 Antarctica/South_Pole Amundsen-Scott Station, South Pole
AQ -6734-06808 Antarctica/Rothera Rothera Station, Adelaide Island
AQ -6448-06406 Antarctica/Palmer Palmer Station, Anvers Island
AQ -6736+06253 Antarctica/Mawson Mawson Station, Holme Bay
AQ -6835+07758 Antarctica/Davis Davis Station, Vestfold Hills
AQ -6617+11031 Antarctica/Casey Casey Station, Bailey Peninsula
AQ -7824+10654 Antarctica/Vostok Vostok Station, Lake Vostok
AQ -6640+14001 Antarctica/DumontDUrville Dumont-d'Urville Station, Terre Adelie
AQ -690022+0393524 Antarctica/Syowa Syowa Station, E Ongul I
AR -3436-05827 America/Argentina/Buenos_Aires Buenos Aires (BA, CF)
AR -3124-06411 America/Argentina/Cordoba most
locations (CB, CC, CN, ER, FM, MN, SE, SF)
AR -2447-06525 America/Argentina/Salta (SA, LP, NQ, RN)
AR -2411-06518 America/Argentina/Jujuy Jujuy (JY)
AR -2649-06513 America/Argentina/Tucuman Tucuman (TM)
AR -2828-06547 America/Argentina/Catamarca Catamarca (CT), Chubut (CH)
AR -2926-06651 America/Argentina/La_Rioja La Rioja (LR)
AR -3132-06831 America/Argentina/San_Juan San Juan (SJ)
AR -3253-06849 America/Argentina/Mendoza Mendoza (MZ)
AR -3319-06621 America/Argentina/San_Luis San Luis (SL)
AR -5138-06913 America/Argentina/Rio_Gallegos Santa Cruz (SC)

```

AR -5448-06818 America/Argentina/Ushuaia Tierra del Fuego (TF)
AS -1416-17042 Pacific/Pago_Pago
AT +4813+01620 Europe/Vienna
AU -3133+15905 Australia/Lord_Howe Lord Howe Island
AU -5430+15857 Antarctica/Macquarie Macquarie Island
AU -4253+14719 Australia/Hobart Tasmania - most locations
AU -3956+14352 Australia/Currie Tasmania - King Island
AU -3749+14458 Australia/Melbourne Victoria
AU -3352+15113 Australia/Sydney New
South Wales - most locations
AU -3157+14127 Australia/Broken_Hill New South Wales - Yancowinna
AU -2728+15302 Australia/Brisbane Queensland - most locations
AU -2016+14900 Australia/Lindeman Queensland - Holiday Islands
AU -3455+13835 Australia/Adelaide South Australia
AU -1228+13050 Australia/Darwin Northern Territory
AU -3157+11551 Australia/Perth Western Australia - most locations
AU -3143+12852 Australia/Eucla Western Australia - Eucla area
AW +1230-06958 America/Aruba
AX +6006+01957 Europe/Mariehamn
AZ +4023+04951 Asia/Baku
BA +4352+01825 Europe/Sarajevo
BB +1306-05937 America/Barbados
BD +2343+09025 Asia/Dhaka
BE +5050+00420 Europe/Brussels
BF +1222-00131 Africa/Ouagadougou
BG +4241+02319 Europe/Sofia
BH +2623+05035 Asia/Bahrain
BI -0323+02922 Africa/Bujumbura
BJ +0629+00237 Africa/Porto-Novo
BL +1753-06251 America/St_Barthelemy
BM +3217-06446 Atlantic/Bermuda
BN +0456+11455 Asia/Brunei
BO -1630-06809 America/La_Paz
BQ +120903-0681636 America/Kralendijk
BR -0351-03225 America/Noronha Atlantic
islands
BR -0127-04829 America/Belem Amapa, E Para
BR -0343-03830 America/Fortaleza NE Brazil (MA, PI, CE, RN, PB)
BR -0803-03454 America/Recife Pernambuco
BR -0712-04812 America/Araguaina Tocantins
BR -0940-03543 America/Maceio Alagoas, Sergipe
BR -1259-03831 America/Bahia Bahia
BR -2332-04637 America/Sao_Paulo S & SE Brazil (GO, DF, MG, ES, RJ, SP, PR, SC, RS)
BR -2027-05437 America/Campo_Grande Mato Grosso do Sul
BR -1535-05605 America/Cuiaba Mato Grosso
BR -0226-05452 America/Santarem W Para
BR -0846-06354 America/Porto_Velho Rondonia
BR +0249-06040 America/Boa_Vista Roraima

BR -0308-06001 America/Manaus E Amazonas
BR -0640-06952 America/Eirunepe W Amazonas
BR -0958-06748 America/Rio_Branco Acre
BS +2505-07721 America/Nassau
BT +2728+08939 Asia/Thimphu
BW -2439+02555 Africa/Gaborone
BY +5354+02734 Europe/Minsk
BZ +1730-08812 America/Belize
CA +4734-05243 America/St_Johns Newfoundland Time, including SE Labrador
CA +4439-06336 America/Halifax Atlantic
Time - Nova Scotia (most places), PEI
CA +4612-05957 America/Glace_Bay Atlantic Time - Nova Scotia - places that did not observe DST 1966-1971
CA +4606-06447 America/Moncton Atlantic Time - New Brunswick
CA +5320-06025 America/Goose_Bay Atlantic Time - Labrador - most locations
CA +5125-05707 America/Blanc-Sablon Atlantic Standard Time - Quebec - Lower North Shore
CA +4531-07334 America/Montreal Eastern Time - Quebec - most locations
CA +4339-07923 America/Toronto Eastern Time - Ontario - most locations
CA +4901-08816 America/Nipigon Eastern Time - Ontario & Quebec - places that did not observe DST 1967-1973
CA +4823-08915 America/Thunder_Bay Eastern Time - Thunder Bay, Ontario
CA +6344-06828 America/Iqaluit Eastern Time - east Nunavut - most locations
CA +6608-06544 America/Pangnirtung Eastern Time - Pangnirtung, Nunavut
CA +744144-0944945 America/Resolute Central Standard Time - Resolute, Nunavut
CA +484531-0913718 America/Atikokan Eastern Standard Time - Atikokan, Ontario and Southampton
I, Nunavut
CA +624900-0920459 America/Rankin_Inlet Central Time - central Nunavut
CA +4953-09709 America/Winnipeg Central Time - Manitoba & west Ontario
CA +4843-09434 America/Rainy_River Central Time - Rainy River & Fort Frances, Ontario
CA +5024-10439 America/Regina Central Standard Time - Saskatchewan - most locations
CA +5017-10750 America/Swift_Current Central Standard Time - Saskatchewan - midwest
CA +5333-11328 America/Edmonton Mountain Time - Alberta, east British Columbia & west Saskatchewan
CA +690650-1050310 America/Cambridge_Bay Mountain Time - west Nunavut
CA +6227-11421 America/Yellowknife Mountain Time - central Northwest Territories
CA +682059-1334300 America/Inuvik Mountain Time - west Northwest Territories
CA +4906-11631 America/Creston Mountain Standard Time - Creston, British Columbia
CA +5946-12014 America/Dawson_Creek Mountain Standard Time - Dawson Creek & Fort Saint John, British
Columbia
CA +4916-12307 America/Vancouver Pacific Time - west British Columbia
CA +6043-13503 America/Whitehorse Pacific
Time - south Yukon
CA +6404-13925 America/Dawson Pacific Time - north Yukon
CC -1210+09655 Indian/Cocos
CD -0418+01518 Africa/Kinshasa west Dem. Rep. of Congo
CD -1140+02728 Africa/Lubumbashi east Dem. Rep. of Congo
CF +0422+01835 Africa/Bangui
CG -0416+01517 Africa/Brazzaville
CH +4723+00832 Europe/Zurich
CI +0519-00402 Africa/Abidjan
CK -2114-15946 Pacific/Rarotonga

CL -3327-07040 America/Santiago most locations
CL -2709-10926 Pacific/Easter Easter Island & Sala y Gomez
CM +0403+00942 Africa/Douala
CN +3114+12128 Asia/Shanghai east China - Beijing, Guangdong, Shanghai, etc.
CN +4545+12641 Asia/Harbin Heilongjiang (except Mohe), Jilin
CN +2934+10635 Asia/Chongqing central China - Sichuan, Yunnan, Guangxi, Shaanxi, Guizhou, etc.
CN +4348+08735 Asia/Urumqi most of Tibet & Xinjiang
CN +3929+07559 Asia/Kashgar west Tibet & Xinjiang
CO +0436-07405 America/Bogota
CR +0956-08405 America/Costa_Rica
CU +2308-08222 America/Havana
CV +1455-02331 Atlantic/Cape_Verde
CW +1211-06900 America/Curacao
CX -1025+10543 Indian/Christmas
CY +3510+03322 Asia/Nicosia
CZ +5005+01426 Europe/Prague
DE +5230+01322 Europe/Berlin most
locations
DE +4742+00841 Europe/Busingen Busingen
DJ +1136+04309 Africa/Djibouti
DK +5540+01235 Europe/Copenhagen
DM +1518-06124 America/Dominica
DO +1828-06954 America/Santo_Domingo
DZ +3647+00303 Africa/Algiers
EC -0210-07950 America/Guayaquil mainland
EC -0054-08936 Pacific/Galapagos Galapagos Islands
EE +5925+02445 Europe/Tallinn
EG +3003+03115 Africa/Cairo
EH +2709-01312 Africa/El_Aaiun
ER +1520+03853 Africa/Asmara
ES +4024-00341 Europe/Madrid mainland
ES +3553-00519 Africa/Ceuta Ceuta & Melilla
ES +2806-01524 Atlantic/Canary Canary Islands
ET +0902+03842 Africa/Addis_Ababa
FI +6010+02458 Europe/Helsinki
FJ -1808+17825 Pacific/Fiji
FK -5142-05751 Atlantic/Stanley
FM +0725+15147 Pacific/Chuuk Chuuk (Truk) and Yap
FM +0658+15813 Pacific/Pohnpei Pohnpei (Ponape)
FM +0519+16259 Pacific/Kosrae Kosrae
FO +6201-00646 Atlantic/Faroe
FR +4852+00220 Europe/Paris
GA +0023+00927 Africa/Libreville
GB +513030-0000731 Europe/London
GD +1203-06145 America/Grenada
GE +4143+04449 Asia/Tbilisi
GF +0456-05220 America/Cayenne
GG +4927-00232 Europe/Guernsey

GH +0533-00013 Africa/Accra
GI +3608-00521 Europe/Gibraltar
GL +6411-05144 America/Godthab most
locations
GL +7646-01840 America/Danmarkshavn east coast, north of Scoresbysund
GL +7029-02158 America/Scoresbysund Scoresbysund / Ittoqqortoormiit
GL +7634-06847 America/Thule Thule / Pituffik
GM +1328-01639 Africa/Banjul
GN +0931-01343 Africa/Conakry
GP +1614-06132 America/Guadeloupe
GQ +0345+00847 Africa/Malabo
GR +3758+02343 Europe/Athens
GS -5416-03632 Atlantic/South_Georgia
GT +1438-09031 America/Guatemala
GU +1328+14445 Pacific/Guam
GW +1151-01535 Africa/Bissau
GY +0648-05810 America/Guyana
HK +2217+11409 Asia/Hong_Kong
HN +1406-08713 America/Tegucigalpa
HR +4548+01558 Europe/Zagreb
HT +1832-07220 America/Port-au-Prince
HU +4730+01905 Europe/Budapest
ID -0610+10648 Asia/Jakarta Java
& Sumatra
ID -0002+10920 Asia/Pontianak west & central Borneo
ID -0507+11924 Asia/Makassar east & south Borneo, Sulawesi (Celebes), Bali, Nusa Tenggara, west Timor
ID -0232+14042 Asia/Jayapura west New Guinea (Irian Jaya) & Maluku (Moluccas)
IE +5320-00615 Europe/Dublin
IL +3146+03514 Asia/Jerusalem
IM +5409-00428 Europe/Isle_of_Man
IN +2232+08822 Asia/Kolkata
IO -0720+07225 Indian/Chagos
IQ +3321+04425 Asia/Baghdad
IR +3540+05126 Asia/Tehran
IS +6409-02151 Atlantic/Reykjavik
IT +4154+01229 Europe/Rome
JE +4912-00207 Europe/Jersey
JM +1800-07648 America/Jamaica
JO +3157+03556 Asia/Amman
JP +353916+1394441 Asia/Tokyo
KE -0117+03649 Africa/Nairobi
KG +4254+07436 Asia/Bishkek
KH +1133+10455 Asia/Phnom_Penh
KI +0125+17300 Pacific/Tarawa Gilbert Islands
KI -0308-17105 Pacific/Enderbury Phoenix Islands
KI +0152-15720 Pacific/Kiritimati Line Islands
KM -1141+04316 Indian/Comoro
KN +1718-06243 America/St_Kitts

KP +3901+12545 Asia/Pyongyang
KR +3733+12658 Asia/Seoul
KW +2920+04759 Asia/Kuwait
KY +1918-08123 America/Cayman
KZ +4315+07657 Asia/Almaty most
locations
KZ +4448+06528 Asia/Qyzylorda Qyzylorda (Kyzylorda, Kzyl-Orda)
KZ +5017+05710 Asia/Aqtobe Aqtobe (Aktobe)
KZ +4431+05016 Asia/Aqtau Atyrau (Atirau, Gur'yev), Mangghystau (Mankistau)
KZ +5113+05121 Asia/Oral West Kazakhstan
LA +1758+10236 Asia/Vientiane
LB +3353+03530 Asia/Beirut
LC +1401-06100 America/St_Lucia
LI +4709+00931 Europe/Vaduz
LK +0656+07951 Asia/Colombo
LR +0618-01047 Africa/Monrovia
LS -2928+02730 Africa/Maseru
LT +5441+02519 Europe/Vilnius
LU +4936+00609 Europe/Luxembourg
LV +5657+02406 Europe/Riga
LY +3254+01311 Africa/Tripoli
MA +3339-00735 Africa/Casablanca
MC +4342+00723 Europe/Monaco
MD +4700+02850 Europe/Chisinau
ME +4226+01916 Europe/Podgorica
MF +1804-06305 America/Marigot
MG -1855+04731 Indian/Antananarivo
MH +0709+17112 Pacific/Majuro most locations
MH +0905+16720 Pacific/Kwajalein Kwajalein
MK +4159+02126 Europe/Skopje
ML +1239-00800 Africa/Bamako
MM +1647+09610 Asia/Rangoon
MN +4755+10653 Asia/Ulaanbaatar most
locations
MN +4801+09139 Asia/Hovd Bayan-Olgii, Govi-Altai, Hovd, Uvs, Zavkhan
MN +4804+11430 Asia/Choibalsan Dornod, Sukhbaatar
MO +2214+11335 Asia/Macau
MP +1512+14545 Pacific/Saipan
MQ +1436-06105 America/Martinique
MR +1806-01557 Africa/Nouakchott
MS +1643-06213 America/Montserrat
MT +3554+01431 Europe/Malta
MU -2010+05730 Indian/Mauritius
MV +0410+07330 Indian/Maldives
MW -1547+03500 Africa/Blantyre
MX +1924-09909 America/Mexico_City Central Time - most locations
MX +2105-08646 America/Cancun Central Time - Quintana Roo
MX +2058-08937 America/Merida Central Time - Campeche, Yucatan

MX +2540-10019 America/Monterrey Mexican Central Time - Coahuila, Durango, Nuevo Leon, Tamaulipas away from US border
MX +2550-09730 America/Matamoros US Central Time - Coahuila, Durango, Nuevo Leon, Tamaulipas near US border
MX +2313-10625 America/Mazatlan Mountain Time - S Baja, Nayarit, Sinaloa
MX +2838-10605 America/Chihuahua Mexican Mountain Time - Chihuahua away from US border
MX +2934-10425 America/Ojinaga US Mountain Time - Chihuahua near US border
MX +2904-11058 America/Hermosillo Mountain Standard Time - Sonora
MX +3232-11701 America/Tijuana US Pacific Time - Baja California near US border
MX +3018-11452 America/Santa_Isabel Mexican Pacific Time - Baja California away from US border
MX +2048-10515 America/Bahia_Banderas Mexican Central Time - Bahia de Banderas
MY +0310+10142 Asia/Kuala_Lumpur peninsular Malaysia
MY +0133+11020 Asia/Kuching Sabah & Sarawak
MZ -2558+03235 Africa/Maputo
NA -2234+01706 Africa/Windhoek
NC -2216+16627 Pacific/Noumea
NE +1331+00207 Africa/Niamey
NF -2903+16758 Pacific/Norfolk
NG +0627+00324 Africa/Lagos
NI +1209-08617 America/Managua
NL +5222+00454 Europe/Amsterdam
NO +5955+01045 Europe/Oslo
NP +2743+08519 Asia/Kathmandu
NR -0031+16655 Pacific/Nauru
NU -1901-16955 Pacific/Niue
NZ -3652+17446 Pacific/Auckland most locations
NZ -4357-17633 Pacific/Chatham Chatham Islands
OM +2336+05835 Asia/Muscat
PA +0858-07932 America/Panama
PE -1203-07703 America/Lima
PF -1732-14934 Pacific/Tahiti Society Islands
PF -0900-13930 Pacific/Marquesas Marquesas Islands
PF -2308-13457 Pacific/Gambier Gambier Islands
PG -0930+14710 Pacific/Port_Moresby
PH +1435+12100 Asia/Manila
PK +2452+06703 Asia/Karachi
PL +5215+02100 Europe/Warsaw
PM +4703-05620 America/Miquelon
PN -2504-13005 Pacific/Pitcairn
PR +182806-0660622 America/Puerto_Rico
PS +3130+03428 Asia/Gaza Gaza Strip
PS +313200+0350542 Asia/Hebron West Bank
PT +3843-00908 Europe/Lisbon mainland
PT +3238-01654 Atlantic/Madeira Madeira Islands
PT +3744-02540 Atlantic/Azores Azores
PW +0720+13429 Pacific/Palau

PY -2516-05740 America/Asuncion
QA +2517+05132 Asia/Qatar
RE -2052+05528 Indian/Reunion
RO +4426+02606 Europe/Bucharest
RS +4450+02030 Europe/Belgrade
RU +5443+02030 Europe/Kaliningrad Moscow-01 - Kaliningrad
RU +5545+03735 Europe/Moscow Moscow+00 - west Russia
RU +4844+04425 Europe/Volgograd Moscow+00 - Caspian Sea
RU +5312+05009 Europe/Samara Moscow+00
- Samara, Udmurtia
RU +5651+06036 Asia/Yekaterinburg Moscow+02 - Urals
RU +5500+07324 Asia/Omsk Moscow+03 - west Siberia
RU +5502+08255 Asia/Novosibirsk Moscow+03 - Novosibirsk
RU +5345+08707 Asia/Novokuznetsk Moscow+03 - Novokuznetsk
RU +5601+09250 Asia/Krasnoyarsk Moscow+04 - Yenisei River
RU +5216+10420 Asia/Irkutsk Moscow+05 - Lake Baikal
RU +6200+12940 Asia/Yakutsk Moscow+06 - Lena River
RU +623923+1353314 Asia/Khandyga Moscow+06 - Tomponsky, Ust-Maysky
RU +4310+13156 Asia/Vladivostok Moscow+07 - Amur River
RU +4658+14242 Asia/Sakhalin Moscow+07 - Sakhalin Island
RU +643337+1431336 Asia/Ust-Nera Moscow+07 - Oymyakonsky
RU +5934+15048 Asia/Magadan Moscow+08 - Magadan
RU +5301+15839 Asia/Kamchatka Moscow+08 - Kamchatka
RU +6445+17729 Asia/Anadyr Moscow+08 - Bering Sea
RW -0157+03004 Africa/Kigali
SA +2438+04643 Asia/Riyadh
SB -0932+16012 Pacific/Guadalcanal
SC -0440+05528 Indian/Mahe
SD +1536+03232 Africa/Khartoum
SE +5920+01803 Europe/Stockholm
SG +0117+10351 Asia/Singapore
SH -1555-00542 Atlantic/St_Helena
SI +4603+01431 Europe/Ljubljana
SJ +7800+01600 Arctic/Longyearbyen
SK +4809+01707 Europe/Bratislava
SL +0830-01315 Africa/Freetown
SM +4355+01228 Europe/San_Marino
SN +1440-01726 Africa/Dakar
SO +0204+04522 Africa/Mogadishu
SR +0550-05510 America/Paramaribo
SS +0451+03136 Africa/Juba
ST +0020+00644 Africa/Sao_Tome
SV +1342-08912 America/El_Salvador
SX +180305-0630250 America/Lower_Princes
SY +3330+03618 Asia/Damascus
SZ -2618+03106 Africa/Mbabane
TC +2128-07108 America/Grand_Turk
TD +1207+01503 Africa/Ndjamena

TF -492110+0701303 Indian/Kerguelen
TG +0608+00113 Africa/Lome
TH +1345+10031 Asia/Bangkok
TJ +3835+06848 Asia/Dushanbe
TK -0922-17114 Pacific/Fakaofu
TL -0833+12535 Asia/Dili
TM +3757+05823 Asia/Ashgabat
TN +3648+01011 Africa/Tunis
TO -2110-17510 Pacific/Tongatapu
TR +4101+02858 Europe/Istanbul
TT +1039-06131 America/Port_of_Spain
TV -0831+17913 Pacific/Funafuti
TW +2503+12130 Asia/Taipei
TZ -0648+03917 Africa/Dar_es_Salaam
UA +5026+03031 Europe/Kiev most
locations
UA +4837+02218 Europe/Uzhgorod Ruthenia
UA +4750+03510 Europe/Zaporozhye Zaporozh'ye, E Lugansk / Zaporizhia, E Luhansk
UA +4457+03406 Europe/Simferopol central Crimea
UG +0019+03225 Africa/Kampala
UM +1645-16931 Pacific/Johnston Johnston Atoll
UM +2813-17722 Pacific/Midway Midway Islands
UM +1917+16637 Pacific/Wake Wake Island
US +404251-0740023 America/New_York Eastern Time
US +421953-0830245 America/Detroit Eastern Time - Michigan - most locations
US +381515-0854534 America/Kentucky/Louisville Eastern Time - Kentucky - Louisville area
US +364947-0845057 America/Kentucky/Monticello Eastern Time - Kentucky - Wayne County
US +394606-0860929 America/Indiana/Indianapolis Eastern Time - Indiana - most locations
US +384038-0873143 America/Indiana/Vincennes Eastern Time - Indiana - Daviess, Dubois, Knox & Martin
Counties
US +410305-0863611 America/Indiana/Winamac Eastern Time - Indiana - Pulaski County
US +382232-0862041 America/Indiana/Marengo Eastern Time - Indiana - Crawford
County
US +382931-0871643 America/Indiana/Petersburg Eastern Time - Indiana - Pike County
US +384452-0850402 America/Indiana/Vevay Eastern Time - Indiana - Switzerland County
US +415100-0873900 America/Chicago Central Time
US +375711-0864541 America/Indiana/Tell_City Central Time - Indiana - Perry County
US +411745-0863730 America/Indiana/Knox Central Time - Indiana - Starke County
US +450628-0873651 America/Menominee Central Time - Michigan - Dickinson, Gogebic, Iron & Menominee
Counties
US +470659-1011757 America/North_Dakota/Center Central Time - North Dakota - Oliver County
US +465042-1012439 America/North_Dakota/New_Salem Central Time - North Dakota - Morton County (except
Mandan area)
US +471551-1014640 America/North_Dakota/Beulah Central Time - North Dakota - Mercer County
US +394421-1045903 America/Denver Mountain Time
US +433649-1161209 America/Boise Mountain Time - south Idaho & east Oregon
US +364708-1084111 America/Shiprock Mountain Time - Navajo
US +332654-1120424 America/Phoenix Mountain

Standard Time - Arizona
US +340308-1181434 America/Los_Angeles Pacific Time
US +611305-1495401 America/Anchorage Alaska Time
US +581807-1342511 America/Juneau Alaska Time - Alaska panhandle
US +571035-1351807 America/Sitka Alaska Time - southeast Alaska panhandle
US +593249-1394338 America/Yakutat Alaska Time - Alaska panhandle neck
US +643004-1652423 America/Nome Alaska Time - west Alaska
US +515248-1763929 America/Adak Aleutian Islands
US +550737-1313435 America/Metlakatla Metlakatla Time - Annette Island
US +211825-1575130 Pacific/Honolulu Hawaii
UY -3453-05611 America/Montevideo
UZ +3940+06648 Asia/Samarkand west Uzbekistan
UZ +4120+06918 Asia/Tashkent east Uzbekistan
VA +415408+0122711 Europe/Vatican
VC +1309-06114 America/St_Vincent
VE +1030-06656 America/Caracas
VG +1827-06437 America/Tortola
VI +1821-06456 America/St_Thomas
VN +1045+10640 Asia/Ho_Chi_Minh
VU -1740+16825 Pacific/Efate
WF -1318-17610 Pacific/Wallis
WS -1350-17144 Pacific/Apia
YE +1245+04512 Asia/Aden
YT -1247+04514 Indian/Mayotte
ZA -2615+02800 Africa/Johannesburg
ZM -1525+02817 Africa/Lusaka
ZW -1750+03103 Africa/Harare

Found

in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/zone.tab

No license file was found, but licenses were detected in source scan.

/*

* Copyright 2003 Sun Microsystems, Inc. All Rights Reserved.

* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.

*

* This code is free software; you can redistribute it and/or modify it

* under the terms of the GNU General Public License version 2 only, as

* published by the Free Software Foundation. Sun designates this

* particular file as subject to the "Classpath" exception as provided

* by Sun in the LICENSE file that accompanied this code.

*

* This code is distributed in the hope that it will be useful, but WITHOUT

* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or

* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License

* version 2 for more details (a copy is included in the LICENSE file that

* accompanied this code).
*
* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to the Free
Software Foundation,
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
*
* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
* CA 95054 USA or visit www.sun.com if you need additional information or
* have any questions.
*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/util/calendar/CalendarUtils.java
No license file was found, but licenses were detected in source scan.

Public Domain Korn Shell <<http://www.cs.mun.ca/~michael/pdksh/>>

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/tzselect.ksh
No license file was found, but licenses were detected in source scan.

License: Public Domain

- Clarify that the data is Public Domain

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzdata.spec
No license file was found, but licenses were detected in source scan.

#

Copyright 2001-2006 Sun Microsystems, Inc. All Rights Reserved.
DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.

#

This code is free software; you can redistribute it and/or modify it
under the terms of the GNU General Public License version 2 only, as
published by the Free Software Foundation. Sun designates this
particular file as subject to the "Classpath" exception as provided
by Sun in the LICENSE file that accompanied this code.

#

This code is distributed in the hope that it will be useful, but WITHOUT
ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
version 2 for more details (a copy is included in the LICENSE file that
accompanied this code).

#

You should have received a copy of the GNU General Public License version
2 along with this work; if not, write to the Free Software
Foundation,
Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.

Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
CA 95054 USA or visit www.sun.com if you need additional information or
have any questions.

JDK 1.1.x compatible time zone IDs
#

Link Australia/Darwin ACT
Link Australia/Sydney AET
Link America/Argentina/Buenos_Aires AGT
Link Africa/Cairo ART
Link America/Anchorage AST
Link America/Sao_Paulo BET
Link Asia/Dhaka BST
Link Africa/Harare CAT
Link America/St_Johns CNT
Link America/Chicago CST
Link Asia/Shanghai CTT
Link Africa/Addis_Ababa EAT
Link Europe/Paris ECT
Link America/New_York EST
Link Pacific/Honolulu HST
Link America/Indiana/Indianapolis IET
Link Asia/Calcutta IST
Link Asia/Tokyo JST
Link Pacific/Apia MIT
Link America/Denver MST
Link Asia/Yerevan NET
Link Pacific/Auckland NST
Link Asia/Karachi PLT
Link America/Phoenix PNT
Link America/Puerto_Rico PRT
Link America/Los_Angeles PST
Link Pacific/Guadalcanal SST
Link Asia/Saigon
VST

The follwong link is required to generate J2SE 1.2.x and 1.3.x
compatible zones. In the Olson public source, MET is defined as
GMT+1:00 with the C-Eur rules. In J2SE, MET is defined as an alias
of Asia/Tehran. This line must be removed if a full set of Olson
zones is generated. Otherwise, MET appears twice in the
ZoneInfoMappings.IDs table.

Link Asia/Tehran MET

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule SystemV min 1973 - Apr lastSun 2:00 1:00 D

Rule SystemV min 1973 - Oct lastSun 2:00 0 S

Rule SystemV 1974 only - Jan 6 2:00 1:00 D

Rule SystemV 1974 only - Nov lastSun 2:00 0 S

Rule SystemV 1975 only - Feb 23 2:00 1:00 D

Rule SystemV 1975 only - Oct lastSun 2:00 0 S

Rule SystemV 1976 max - Apr lastSun 2:00 1:00 D

Rule SystemV 1976 max - Oct lastSun 2:00 0 S

Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]

Zone SystemV/AST4ADT -4:00 SystemV A%sT

Zone SystemV/EST5EDT -5:00 SystemV E%sT

Zone SystemV/CST6CDT -6:00 SystemV C%sT

Zone SystemV/MST7MDT -7:00 SystemV M%sT

Zone SystemV/PST8PDT -8:00 SystemV P%sT

Zone SystemV/YST9YDT -9:00 SystemV Y%sT

Zone SystemV/AST4 -4:00 - AST

Zone SystemV/EST5 -5:00 - EST

Zone SystemV/CST6 -6:00 - CST

Zone SystemV/MST7 -7:00 - MST

Zone SystemV/PST8 -8:00 - PST

Zone SystemV/YST9 -9:00 - YST

Zone SystemV/HST10 -10:00 - HST

#

#

For the UTC change in Mustang

#

Link GMT UTC

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/tzdata_jdk/jdk11_full_backward

No license file was found, but licenses were detected in source scan.

README for the tz distribution

This file is in the public domain, so clarified as of
2009-05-17 by Arthur David Olson.

"What time is it?" -- Richard Deacon as The King

"Any time you want it to be." -- Frank Baxter as The Scientist
(from the Bell System film "About Time")

The 1989 update of the time zone package featured

- * POSIXization (including interpretation of POSIX-style TZ environment variables, provided by Guy Harris),
- * ANSIfication (including versions of "mktime" and "difftime"),
- * SVIDulation (an "altzone" variable)
- * MACHination (the "gtime" function)
- * corrections to some time zone data (including corrections to the rules for Great Britain and New Zealand)
- * reference data from the United States Naval Observatory for folks who want to do additional time zones
- * and the 1989 data for Saudi Arabia.

(Since this code will be treated as "part of the implementation" in some places and as "part of the application" in others, there's no good way to name functions, such as timegm, that are not part of the proposed ANSI C standard; such functions have kept their old, underscore-free names in this update.)

And the "dysize" function has disappeared; it was present to allow compilation of the "date" command on old BSD systems, and a version of "date" is now provided in the package. The "date" command is not created when you "make all" since it may lack options provided by the version distributed with your operating system, or may not interact with the system in the same way the native version does.

Since POSIX frowns on correct leap second handling, the default behavior of the "zic" command (in the absence of a "-L" option) has been changed to omit leap second information from its output files.

Here is a recipe for acquiring, building, installing, and testing the tz distribution on a GNU/Linux or similar host.

```
mkdir tz
cd tz
wget --retr-symlinks 'ftp://ftp.iana.org/tz/tz*-latest.tar.gz'
gzip
-dc tzcode-latest.tar.gz | tar -xf -
gzip -dc tzdata-latest.tar.gz | tar -xf -
```

Be sure to read the comments in "Makefile" and make any changes needed to make things right for your system, especially if you are using some platform other than GNU/Linux. Then run the following commands, substituting your desired installation directory for "\$HOME/tzdir":

```
make TOPDIR=$HOME/tzdir install
$HOME/tzdir/etc/zdump -v America/Los_Angeles
```

To use the new functions, use a "-ltz" option when compiling or linking.

Historical local time information has been included here to:

- * provide a compendium of data about the history of civil time that is useful even if the data are not 100% accurate;
- * give an idea of the variety of local time rules that have existed in the past and thus an idea of the variety that may be expected in the future;
- * provide a test of the generality of the local time rule description system.

The information in the time zone data files is by no means authoritative; the files currently do not even attempt to cover all time stamps before 1970, and there are undoubtedly errors even for time stamps since 1970. If you know that the rules are different from those in a file, by all means feel free to change file (and please send the changed version to tz@iana.org for use in the future). Europeans take note!

Thanks to these Timezone Caballeros who've made major contributions to the time conversion package: Keith Bostic; Bob Devine; Paul Eggert; Robert Elz; Guy Harris; Mark Horton; John Mackin; and Bradley White. Thanks also to Michael Bloom, Art Neilson, Stephen Prince, John Sovereign, and Frank Wales for testing work, and to Gwillim Law for checking local mean time data. None of them are responsible for remaining errors.

Look in `<ftp://ftp.iana.org/tz/releases/>` for updated versions of these files.

Please send comments or information to tz@iana.org.

Postscript: The README above is largely unmodified (aside from details of mailing list and ftp archive addresses) from that prepared many years ago by Arthur David Olson, to whom the timezone community owes the greatest debt of all. Arthur is not currently maintaining this data or code (though he remains involved).

Found in path(s):

* `/opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/README`
No license file was found, but licenses were detected in source scan.

This file is in the public domain, so clarified as of

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/tz-art.htm

No license file was found, but licenses were detected in source scan.

<pre>

This file is in the public domain, so clarified as of

2009-05-17 by Arthur David Olson.

Apparent noon times below are for Riyadh; they're a bit off for other places.

Times were computed using formulas in the U.S. Naval Observatory's

Almanac for Computers 1988; the formulas "will give EqT to an accuracy of

[plus or minus two] seconds during the current year."

#

Rounding to the nearest five seconds results in fewer than

256 different "time types"--a limit that's faced because time types are

stored on disk as unsigned chars.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule sol88 1988 only - Jan 1 12:03:15s -0:03:15 -

Rule sol88 1988 only - Jan 2 12:03:40s -0:03:40 -

Rule sol88 1988 only - Jan 3 12:04:10s -0:04:10 -

Rule sol88 1988 only - Jan 4 12:04:40s -0:04:40 -

Rule sol88 1988 only - Jan 5 12:05:05s -0:05:05 -

Rule sol88 1988 only - Jan 6 12:05:30s -0:05:30 -

Rule sol88 1988 only - Jan 7 12:06:00s

-0:06:00 -

Rule sol88 1988 only - Jan 8 12:06:25s -0:06:25 -

Rule sol88 1988 only - Jan 9 12:06:50s -0:06:50 -

Rule sol88 1988 only - Jan 10 12:07:15s -0:07:15 -

Rule sol88 1988 only - Jan 11 12:07:40s -0:07:40 -

Rule sol88 1988 only - Jan 12 12:08:05s -0:08:05 -

Rule sol88 1988 only - Jan 13 12:08:25s -0:08:25 -

Rule sol88 1988 only - Jan 14 12:08:50s -0:08:50 -

Rule sol88 1988 only - Jan 15 12:09:10s -0:09:10 -

Rule sol88 1988 only - Jan 16 12:09:30s -0:09:30 -

Rule sol88 1988 only - Jan 17 12:09:50s -0:09:50 -

Rule sol88 1988 only - Jan 18 12:10:10s -0:10:10 -

Rule sol88 1988 only - Jan 19 12:10:30s -0:10:30 -

Rule sol88 1988 only - Jan 20 12:10:50s -0:10:50 -

Rule sol88 1988 only - Jan 21 12:11:05s -0:11:05 -

Rule sol88 1988 only - Jan 22 12:11:25s -0:11:25 -

Rule sol88 1988 only - Jan 23 12:11:40s -0:11:40 -

Rule sol88 1988 only - Jan 24 12:11:55s -0:11:55 -

Rule sol88 1988 only - Jan 25 12:12:10s -0:12:10 -

Rule sol88 1988 only - Jan 26 12:12:25s -0:12:25 -

Rule sol88 1988 only - Jan 27 12:12:40s

-0:12:40 -

Rule sol88 1988 only - Jan 28 12:12:50s -0:12:50 -

Rule sol88 1988 only - Jan 29 12:13:00s -0:13:00 -
Rule sol88 1988 only - Jan 30 12:13:10s -0:13:10 -
Rule sol88 1988 only - Jan 31 12:13:20s -0:13:20 -
Rule sol88 1988 only - Feb 1 12:13:30s -0:13:30 -
Rule sol88 1988 only - Feb 2 12:13:40s -0:13:40 -
Rule sol88 1988 only - Feb 3 12:13:45s -0:13:45 -
Rule sol88 1988 only - Feb 4 12:13:55s -0:13:55 -
Rule sol88 1988 only - Feb 5 12:14:00s -0:14:00 -
Rule sol88 1988 only - Feb 6 12:14:05s -0:14:05 -
Rule sol88 1988 only - Feb 7 12:14:10s -0:14:10 -
Rule sol88 1988 only - Feb 8 12:14:10s -0:14:10 -
Rule sol88 1988 only - Feb 9 12:14:15s -0:14:15 -
Rule sol88 1988 only - Feb 10 12:14:15s -0:14:15 -
Rule sol88 1988 only - Feb 11 12:14:15s -0:14:15 -
Rule sol88 1988 only - Feb 12 12:14:15s -0:14:15 -
Rule sol88 1988 only - Feb 13 12:14:15s -0:14:15 -
Rule sol88 1988 only - Feb 14 12:14:15s -0:14:15 -
Rule sol88 1988 only - Feb 15 12:14:10s -0:14:10
-
Rule sol88 1988 only - Feb 16 12:14:10s -0:14:10 -
Rule sol88 1988 only - Feb 17 12:14:05s -0:14:05 -
Rule sol88 1988 only - Feb 18 12:14:00s -0:14:00 -
Rule sol88 1988 only - Feb 19 12:13:55s -0:13:55 -
Rule sol88 1988 only - Feb 20 12:13:50s -0:13:50 -
Rule sol88 1988 only - Feb 21 12:13:45s -0:13:45 -
Rule sol88 1988 only - Feb 22 12:13:40s -0:13:40 -
Rule sol88 1988 only - Feb 23 12:13:30s -0:13:30 -
Rule sol88 1988 only - Feb 24 12:13:20s -0:13:20 -
Rule sol88 1988 only - Feb 25 12:13:15s -0:13:15 -
Rule sol88 1988 only - Feb 26 12:13:05s -0:13:05 -
Rule sol88 1988 only - Feb 27 12:12:55s -0:12:55 -
Rule sol88 1988 only - Feb 28 12:12:45s -0:12:45 -
Rule sol88 1988 only - Feb 29 12:12:30s -0:12:30 -
Rule sol88 1988 only - Mar 1 12:12:20s -0:12:20 -
Rule sol88 1988 only - Mar 2 12:12:10s -0:12:10 -
Rule sol88 1988 only - Mar 3 12:11:55s -0:11:55 -
Rule sol88 1988 only - Mar 4 12:11:45s -0:11:45 -
Rule sol88 1988 only - Mar 5 12:11:30s -0:11:30 -
Rule sol88 1988 only - Mar 6 12:11:15s
-0:11:15 -
Rule sol88 1988 only - Mar 7 12:11:00s -0:11:00 -
Rule sol88 1988 only - Mar 8 12:10:45s -0:10:45 -
Rule sol88 1988 only - Mar 9 12:10:30s -0:10:30 -
Rule sol88 1988 only - Mar 10 12:10:15s -0:10:15 -
Rule sol88 1988 only - Mar 11 12:10:00s -0:10:00 -
Rule sol88 1988 only - Mar 12 12:09:45s -0:09:45 -
Rule sol88 1988 only - Mar 13 12:09:30s -0:09:30 -
Rule sol88 1988 only - Mar 14 12:09:10s -0:09:10 -

Rule sol88 1988 only - Mar 15 12:08:55s -0:08:55 -
Rule sol88 1988 only - Mar 16 12:08:40s -0:08:40 -
Rule sol88 1988 only - Mar 17 12:08:20s -0:08:20 -
Rule sol88 1988 only - Mar 18 12:08:05s -0:08:05 -
Rule sol88 1988 only - Mar 19 12:07:45s -0:07:45 -
Rule sol88 1988 only - Mar 20 12:07:30s -0:07:30 -
Rule sol88 1988 only - Mar 21 12:07:10s -0:07:10 -
Rule sol88 1988 only - Mar 22 12:06:50s -0:06:50 -
Rule sol88 1988 only - Mar 23 12:06:35s -0:06:35 -
Rule sol88 1988 only - Mar 24 12:06:15s -0:06:15 -
Rule sol88 1988 only - Mar 25 12:06:00s -0:06:00 -
Rule sol88 1988 only - Mar 26 12:05:40s
-0:05:40 -
Rule sol88 1988 only - Mar 27 12:05:20s -0:05:20 -
Rule sol88 1988 only - Mar 28 12:05:05s -0:05:05 -
Rule sol88 1988 only - Mar 29 12:04:45s -0:04:45 -
Rule sol88 1988 only - Mar 30 12:04:25s -0:04:25 -
Rule sol88 1988 only - Mar 31 12:04:10s -0:04:10 -
Rule sol88 1988 only - Apr 1 12:03:50s -0:03:50 -
Rule sol88 1988 only - Apr 2 12:03:35s -0:03:35 -
Rule sol88 1988 only - Apr 3 12:03:15s -0:03:15 -
Rule sol88 1988 only - Apr 4 12:03:00s -0:03:00 -
Rule sol88 1988 only - Apr 5 12:02:40s -0:02:40 -
Rule sol88 1988 only - Apr 6 12:02:25s -0:02:25 -
Rule sol88 1988 only - Apr 7 12:02:05s -0:02:05 -
Rule sol88 1988 only - Apr 8 12:01:50s -0:01:50 -
Rule sol88 1988 only - Apr 9 12:01:35s -0:01:35 -
Rule sol88 1988 only - Apr 10 12:01:15s -0:01:15 -
Rule sol88 1988 only - Apr 11 12:01:00s -0:01:00 -
Rule sol88 1988 only - Apr 12 12:00:45s -0:00:45 -
Rule sol88 1988 only - Apr 13 12:00:30s -0:00:30 -
Rule sol88 1988 only - Apr 14 12:00:15s -0:00:15 -
Rule sol88 1988 only - Apr 15 12:00:00s
0:00:00 -
Rule sol88 1988 only - Apr 16 11:59:45s 0:00:15 -
Rule sol88 1988 only - Apr 17 11:59:30s 0:00:30 -
Rule sol88 1988 only - Apr 18 11:59:20s 0:00:40 -
Rule sol88 1988 only - Apr 19 11:59:05s 0:00:55 -
Rule sol88 1988 only - Apr 20 11:58:55s 0:01:05 -
Rule sol88 1988 only - Apr 21 11:58:40s 0:01:20 -
Rule sol88 1988 only - Apr 22 11:58:30s 0:01:30 -
Rule sol88 1988 only - Apr 23 11:58:15s 0:01:45 -
Rule sol88 1988 only - Apr 24 11:58:05s 0:01:55 -
Rule sol88 1988 only - Apr 25 11:57:55s 0:02:05 -
Rule sol88 1988 only - Apr 26 11:57:45s 0:02:15 -
Rule sol88 1988 only - Apr 27 11:57:35s 0:02:25 -
Rule sol88 1988 only - Apr 28 11:57:30s 0:02:30 -
Rule sol88 1988 only - Apr 29 11:57:20s 0:02:40 -

Rule sol88 1988 only - Apr 30 11:57:10s 0:02:50 -
Rule sol88 1988 only - May 1 11:57:05s 0:02:55 -
Rule sol88 1988 only - May 2 11:56:55s 0:03:05 -
Rule sol88 1988 only - May 3 11:56:50s 0:03:10 -
Rule sol88 1988 only - May 4 11:56:45s 0:03:15 -
Rule sol88 1988 only - May 5 11:56:40s
0:03:20 -
Rule sol88 1988 only - May 6 11:56:35s 0:03:25 -
Rule sol88 1988 only - May 7 11:56:30s 0:03:30 -
Rule sol88 1988 only - May 8 11:56:25s 0:03:35 -
Rule sol88 1988 only - May 9 11:56:25s 0:03:35 -
Rule sol88 1988 only - May 10 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 11 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 12 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 13 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 14 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 15 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 16 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 17 11:56:20s 0:03:40 -
Rule sol88 1988 only - May 18 11:56:25s 0:03:35 -
Rule sol88 1988 only - May 19 11:56:25s 0:03:35 -
Rule sol88 1988 only - May 20 11:56:30s 0:03:30 -
Rule sol88 1988 only - May 21 11:56:35s 0:03:25 -
Rule sol88 1988 only - May 22 11:56:40s 0:03:20 -
Rule sol88 1988 only - May 23 11:56:45s 0:03:15 -
Rule sol88 1988 only - May 24 11:56:50s 0:03:10 -
Rule sol88 1988 only - May 25 11:56:55s
0:03:05 -
Rule sol88 1988 only - May 26 11:57:00s 0:03:00 -
Rule sol88 1988 only - May 27 11:57:05s 0:02:55 -
Rule sol88 1988 only - May 28 11:57:15s 0:02:45 -
Rule sol88 1988 only - May 29 11:57:20s 0:02:40 -
Rule sol88 1988 only - May 30 11:57:30s 0:02:30 -
Rule sol88 1988 only - May 31 11:57:40s 0:02:20 -
Rule sol88 1988 only - Jun 1 11:57:50s 0:02:10 -
Rule sol88 1988 only - Jun 2 11:57:55s 0:02:05 -
Rule sol88 1988 only - Jun 3 11:58:05s 0:01:55 -
Rule sol88 1988 only - Jun 4 11:58:15s 0:01:45 -
Rule sol88 1988 only - Jun 5 11:58:30s 0:01:30 -
Rule sol88 1988 only - Jun 6 11:58:40s 0:01:20 -
Rule sol88 1988 only - Jun 7 11:58:50s 0:01:10 -
Rule sol88 1988 only - Jun 8 11:59:00s 0:01:00 -
Rule sol88 1988 only - Jun 9 11:59:15s 0:00:45 -
Rule sol88 1988 only - Jun 10 11:59:25s 0:00:35 -
Rule sol88 1988 only - Jun 11 11:59:35s 0:00:25 -
Rule sol88 1988 only - Jun 12 11:59:50s 0:00:10 -
Rule sol88 1988 only - Jun 13 12:00:00s 0:00:00 -
Rule sol88 1988 only - Jun 14 12:00:15s

-0:00:15 -

Rule sol88 1988 only - Jun 15 12:00:25s -0:00:25 -
Rule sol88 1988 only - Jun 16 12:00:40s -0:00:40 -
Rule sol88 1988 only - Jun 17 12:00:55s -0:00:55 -
Rule sol88 1988 only - Jun 18 12:01:05s -0:01:05 -
Rule sol88 1988 only - Jun 19 12:01:20s -0:01:20 -
Rule sol88 1988 only - Jun 20 12:01:30s -0:01:30 -
Rule sol88 1988 only - Jun 21 12:01:45s -0:01:45 -
Rule sol88 1988 only - Jun 22 12:02:00s -0:02:00 -
Rule sol88 1988 only - Jun 23 12:02:10s -0:02:10 -
Rule sol88 1988 only - Jun 24 12:02:25s -0:02:25 -
Rule sol88 1988 only - Jun 25 12:02:35s -0:02:35 -
Rule sol88 1988 only - Jun 26 12:02:50s -0:02:50 -
Rule sol88 1988 only - Jun 27 12:03:00s -0:03:00 -
Rule sol88 1988 only - Jun 28 12:03:15s -0:03:15 -
Rule sol88 1988 only - Jun 29 12:03:25s -0:03:25 -
Rule sol88 1988 only - Jun 30 12:03:40s -0:03:40 -
Rule sol88 1988 only - Jul 1 12:03:50s -0:03:50 -
Rule sol88 1988 only - Jul 2 12:04:00s -0:04:00 -
Rule sol88 1988 only - Jul 3 12:04:10s -0:04:10 -
Rule sol88 1988 only - Jul 4 12:04:25s

-0:04:25 -

Rule sol88 1988 only - Jul 5 12:04:35s -0:04:35 -
Rule sol88 1988 only - Jul 6 12:04:45s -0:04:45 -
Rule sol88 1988 only - Jul 7 12:04:55s -0:04:55 -
Rule sol88 1988 only - Jul 8 12:05:05s -0:05:05 -
Rule sol88 1988 only - Jul 9 12:05:10s -0:05:10 -
Rule sol88 1988 only - Jul 10 12:05:20s -0:05:20 -
Rule sol88 1988 only - Jul 11 12:05:30s -0:05:30 -
Rule sol88 1988 only - Jul 12 12:05:35s -0:05:35 -
Rule sol88 1988 only - Jul 13 12:05:45s -0:05:45 -
Rule sol88 1988 only - Jul 14 12:05:50s -0:05:50 -
Rule sol88 1988 only - Jul 15 12:05:55s -0:05:55 -
Rule sol88 1988 only - Jul 16 12:06:00s -0:06:00 -
Rule sol88 1988 only - Jul 17 12:06:05s -0:06:05 -
Rule sol88 1988 only - Jul 18 12:06:10s -0:06:10 -
Rule sol88 1988 only - Jul 19 12:06:15s -0:06:15 -
Rule sol88 1988 only - Jul 20 12:06:20s -0:06:20 -
Rule sol88 1988 only - Jul 21 12:06:25s -0:06:25 -
Rule sol88 1988 only - Jul 22 12:06:25s -0:06:25 -
Rule sol88 1988 only - Jul 23 12:06:25s -0:06:25

-

Rule sol88 1988 only - Jul 24 12:06:30s -0:06:30 -
Rule sol88 1988 only - Jul 25 12:06:30s -0:06:30 -
Rule sol88 1988 only - Jul 26 12:06:30s -0:06:30 -
Rule sol88 1988 only - Jul 27 12:06:30s -0:06:30 -
Rule sol88 1988 only - Jul 28 12:06:30s -0:06:30 -
Rule sol88 1988 only - Jul 29 12:06:25s -0:06:25 -

Rule sol88 1988 only - Jul 30 12:06:25s -0:06:25 -
Rule sol88 1988 only - Jul 31 12:06:20s -0:06:20 -
Rule sol88 1988 only - Aug 1 12:06:15s -0:06:15 -
Rule sol88 1988 only - Aug 2 12:06:15s -0:06:15 -
Rule sol88 1988 only - Aug 3 12:06:10s -0:06:10 -
Rule sol88 1988 only - Aug 4 12:06:05s -0:06:05 -
Rule sol88 1988 only - Aug 5 12:05:55s -0:05:55 -
Rule sol88 1988 only - Aug 6 12:05:50s -0:05:50 -
Rule sol88 1988 only - Aug 7 12:05:45s -0:05:45 -
Rule sol88 1988 only - Aug 8 12:05:35s -0:05:35 -
Rule sol88 1988 only - Aug 9 12:05:25s -0:05:25 -
Rule sol88 1988 only - Aug 10 12:05:20s -0:05:20 -
Rule sol88 1988 only - Aug 11 12:05:10s -0:05:10 -
Rule sol88 1988 only - Aug 12 12:05:00s
-0:05:00 -
Rule sol88 1988 only - Aug 13 12:04:50s -0:04:50 -
Rule sol88 1988 only - Aug 14 12:04:35s -0:04:35 -
Rule sol88 1988 only - Aug 15 12:04:25s -0:04:25 -
Rule sol88 1988 only - Aug 16 12:04:15s -0:04:15 -
Rule sol88 1988 only - Aug 17 12:04:00s -0:04:00 -
Rule sol88 1988 only - Aug 18 12:03:50s -0:03:50 -
Rule sol88 1988 only - Aug 19 12:03:35s -0:03:35 -
Rule sol88 1988 only - Aug 20 12:03:20s -0:03:20 -
Rule sol88 1988 only - Aug 21 12:03:05s -0:03:05 -
Rule sol88 1988 only - Aug 22 12:02:50s -0:02:50 -
Rule sol88 1988 only - Aug 23 12:02:35s -0:02:35 -
Rule sol88 1988 only - Aug 24 12:02:20s -0:02:20 -
Rule sol88 1988 only - Aug 25 12:02:00s -0:02:00 -
Rule sol88 1988 only - Aug 26 12:01:45s -0:01:45 -
Rule sol88 1988 only - Aug 27 12:01:30s -0:01:30 -
Rule sol88 1988 only - Aug 28 12:01:10s -0:01:10 -
Rule sol88 1988 only - Aug 29 12:00:50s -0:00:50 -
Rule sol88 1988 only - Aug 30 12:00:35s -0:00:35 -
Rule sol88 1988 only - Aug 31 12:00:15s -0:00:15 -
Rule sol88 1988 only - Sep 1 11:59:55s
0:00:05 -
Rule sol88 1988 only - Sep 2 11:59:35s 0:00:25 -
Rule sol88 1988 only - Sep 3 11:59:20s 0:00:40 -
Rule sol88 1988 only - Sep 4 11:59:00s 0:01:00 -
Rule sol88 1988 only - Sep 5 11:58:40s 0:01:20 -
Rule sol88 1988 only - Sep 6 11:58:20s 0:01:40 -
Rule sol88 1988 only - Sep 7 11:58:00s 0:02:00 -
Rule sol88 1988 only - Sep 8 11:57:35s 0:02:25 -
Rule sol88 1988 only - Sep 9 11:57:15s 0:02:45 -
Rule sol88 1988 only - Sep 10 11:56:55s 0:03:05 -
Rule sol88 1988 only - Sep 11 11:56:35s 0:03:25 -
Rule sol88 1988 only - Sep 12 11:56:15s 0:03:45 -
Rule sol88 1988 only - Sep 13 11:55:50s 0:04:10 -

Rule sol88 1988 only - Sep 14 11:55:30s 0:04:30 -
Rule sol88 1988 only - Sep 15 11:55:10s 0:04:50 -
Rule sol88 1988 only - Sep 16 11:54:50s 0:05:10 -
Rule sol88 1988 only - Sep 17 11:54:25s 0:05:35 -
Rule sol88 1988 only - Sep 18 11:54:05s 0:05:55 -
Rule sol88 1988 only - Sep 19 11:53:45s 0:06:15 -
Rule sol88 1988 only - Sep 20 11:53:25s 0:06:35 -
Rule sol88 1988 only - Sep 21 11:53:00s
0:07:00 -
Rule sol88 1988 only - Sep 22 11:52:40s 0:07:20 -
Rule sol88 1988 only - Sep 23 11:52:20s 0:07:40 -
Rule sol88 1988 only - Sep 24 11:52:00s 0:08:00 -
Rule sol88 1988 only - Sep 25 11:51:40s 0:08:20 -
Rule sol88 1988 only - Sep 26 11:51:15s 0:08:45 -
Rule sol88 1988 only - Sep 27 11:50:55s 0:09:05 -
Rule sol88 1988 only - Sep 28 11:50:35s 0:09:25 -
Rule sol88 1988 only - Sep 29 11:50:15s 0:09:45 -
Rule sol88 1988 only - Sep 30 11:49:55s 0:10:05 -
Rule sol88 1988 only - Oct 1 11:49:35s 0:10:25 -
Rule sol88 1988 only - Oct 2 11:49:20s 0:10:40 -
Rule sol88 1988 only - Oct 3 11:49:00s 0:11:00 -
Rule sol88 1988 only - Oct 4 11:48:40s 0:11:20 -
Rule sol88 1988 only - Oct 5 11:48:25s 0:11:35 -
Rule sol88 1988 only - Oct 6 11:48:05s 0:11:55 -
Rule sol88 1988 only - Oct 7 11:47:50s 0:12:10 -
Rule sol88 1988 only - Oct 8 11:47:30s 0:12:30 -
Rule sol88 1988 only - Oct 9 11:47:15s 0:12:45 -
Rule sol88 1988 only - Oct 10 11:47:00s 0:13:00 -
Rule sol88 1988 only - Oct 11 11:46:45s
0:13:15 -
Rule sol88 1988 only - Oct 12 11:46:30s 0:13:30 -
Rule sol88 1988 only - Oct 13 11:46:15s 0:13:45 -
Rule sol88 1988 only - Oct 14 11:46:00s 0:14:00 -
Rule sol88 1988 only - Oct 15 11:45:45s 0:14:15 -
Rule sol88 1988 only - Oct 16 11:45:35s 0:14:25 -
Rule sol88 1988 only - Oct 17 11:45:20s 0:14:40 -
Rule sol88 1988 only - Oct 18 11:45:10s 0:14:50 -
Rule sol88 1988 only - Oct 19 11:45:00s 0:15:00 -
Rule sol88 1988 only - Oct 20 11:44:45s 0:15:15 -
Rule sol88 1988 only - Oct 21 11:44:40s 0:15:20 -
Rule sol88 1988 only - Oct 22 11:44:30s 0:15:30 -
Rule sol88 1988 only - Oct 23 11:44:20s 0:15:40 -
Rule sol88 1988 only - Oct 24 11:44:10s 0:15:50 -
Rule sol88 1988 only - Oct 25 11:44:05s 0:15:55 -
Rule sol88 1988 only - Oct 26 11:44:00s 0:16:00 -
Rule sol88 1988 only - Oct 27 11:43:55s 0:16:05 -
Rule sol88 1988 only - Oct 28 11:43:50s 0:16:10 -
Rule sol88 1988 only - Oct 29 11:43:45s 0:16:15 -

Rule sol88 1988 only - Oct 30 11:43:40s 0:16:20 -
Rule sol88 1988 only - Oct 31 11:43:40s
0:16:20 -
Rule sol88 1988 only - Nov 1 11:43:35s 0:16:25 -
Rule sol88 1988 only - Nov 2 11:43:35s 0:16:25 -
Rule sol88 1988 only - Nov 3 11:43:35s 0:16:25 -
Rule sol88 1988 only - Nov 4 11:43:35s 0:16:25 -
Rule sol88 1988 only - Nov 5 11:43:40s 0:16:20 -
Rule sol88 1988 only - Nov 6 11:43:40s 0:16:20 -
Rule sol88 1988 only - Nov 7 11:43:45s 0:16:15 -
Rule sol88 1988 only - Nov 8 11:43:45s 0:16:15 -
Rule sol88 1988 only - Nov 9 11:43:50s 0:16:10 -
Rule sol88 1988 only - Nov 10 11:44:00s 0:16:00 -
Rule sol88 1988 only - Nov 11 11:44:05s 0:15:55 -
Rule sol88 1988 only - Nov 12 11:44:10s 0:15:50 -
Rule sol88 1988 only - Nov 13 11:44:20s 0:15:40 -
Rule sol88 1988 only - Nov 14 11:44:30s 0:15:30 -
Rule sol88 1988 only - Nov 15 11:44:40s 0:15:20 -
Rule sol88 1988 only - Nov 16 11:44:50s 0:15:10 -
Rule sol88 1988 only - Nov 17 11:45:00s 0:15:00 -
Rule sol88 1988 only - Nov 18 11:45:15s 0:14:45 -
Rule sol88 1988 only - Nov 19 11:45:25s 0:14:35 -
Rule sol88 1988 only - Nov 20 11:45:40s 0:14:20
-
Rule sol88 1988 only - Nov 21 11:45:55s 0:14:05 -
Rule sol88 1988 only - Nov 22 11:46:10s 0:13:50 -
Rule sol88 1988 only - Nov 23 11:46:30s 0:13:30 -
Rule sol88 1988 only - Nov 24 11:46:45s 0:13:15 -
Rule sol88 1988 only - Nov 25 11:47:05s 0:12:55 -
Rule sol88 1988 only - Nov 26 11:47:20s 0:12:40 -
Rule sol88 1988 only - Nov 27 11:47:40s 0:12:20 -
Rule sol88 1988 only - Nov 28 11:48:00s 0:12:00 -
Rule sol88 1988 only - Nov 29 11:48:25s 0:11:35 -
Rule sol88 1988 only - Nov 30 11:48:45s 0:11:15 -
Rule sol88 1988 only - Dec 1 11:49:05s 0:10:55 -
Rule sol88 1988 only - Dec 2 11:49:30s 0:10:30 -
Rule sol88 1988 only - Dec 3 11:49:55s 0:10:05 -
Rule sol88 1988 only - Dec 4 11:50:15s 0:09:45 -
Rule sol88 1988 only - Dec 5 11:50:40s 0:09:20 -
Rule sol88 1988 only - Dec 6 11:51:05s 0:08:55 -
Rule sol88 1988 only - Dec 7 11:51:35s 0:08:25 -
Rule sol88 1988 only - Dec 8 11:52:00s 0:08:00 -
Rule sol88 1988 only - Dec 9 11:52:25s 0:07:35 -
Rule sol88 1988 only - Dec 10 11:52:55s 0:07:05 -
Rule sol88 1988 only - Dec 11 11:53:20s
0:06:40 -
Rule sol88 1988 only - Dec 12 11:53:50s 0:06:10 -
Rule sol88 1988 only - Dec 13 11:54:15s 0:05:45 -

Rule sol88 1988 only - Dec 14 11:54:45s 0:05:15 -
Rule sol88 1988 only - Dec 15 11:55:15s 0:04:45 -
Rule sol88 1988 only - Dec 16 11:55:45s 0:04:15 -
Rule sol88 1988 only - Dec 17 11:56:15s 0:03:45 -
Rule sol88 1988 only - Dec 18 11:56:40s 0:03:20 -
Rule sol88 1988 only - Dec 19 11:57:10s 0:02:50 -
Rule sol88 1988 only - Dec 20 11:57:40s 0:02:20 -
Rule sol88 1988 only - Dec 21 11:58:10s 0:01:50 -
Rule sol88 1988 only - Dec 22 11:58:40s 0:01:20 -
Rule sol88 1988 only - Dec 23 11:59:10s 0:00:50 -
Rule sol88 1988 only - Dec 24 11:59:40s 0:00:20 -
Rule sol88 1988 only - Dec 25 12:00:10s -0:00:10 -
Rule sol88 1988 only - Dec 26 12:00:40s -0:00:40 -
Rule sol88 1988 only - Dec 27 12:01:10s -0:01:10 -
Rule sol88 1988 only - Dec 28 12:01:40s -0:01:40 -
Rule sol88 1988 only - Dec 29 12:02:10s -0:02:10 -
Rule sol88 1988 only - Dec 30 12:02:35s -0:02:35
-
Rule sol88 1988 only - Dec 31 12:03:05s -0:03:05 -

Riyadh is at about 46 degrees 46 minutes East: 3 hrs, 7 mins, 4 secs
Before and after 1988, we'll operate on local mean solar time.

Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]

Zone Asia/Riyadh88 3:07:04 - zzz 1988

3:07:04 sol88 zzz 1989

3:07:04 - zzz

For backward compatibility...

Link Asia/Riyadh88 Mideast/Riyadh88

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/solar88

No license file was found, but licenses were detected in source scan.

From d3b025adb25554ee10b986850371e573df92733e Mon Sep 17 00:00:00 2001

From: Paul Eggert <eggert@cs.ucla.edu>

Date: Mon, 27 May 2013 18:08:26 -0700

Subject: [PATCH] Adjust commentary to try to defuse recent issues somewhat.

This change stemmed from a long discussion on the tz mailing list about what country the Jerusalem zone entry is in. The idea of this change is to deemphasize the role of countries in the tz database, to lessen the amount of controversy in the future.

Due to backward compatibility concerns this change does not eliminate the role of countries entirely. With one minor exception this change does not alter any code or data, just comments.

* Theory, zone.tab: Deemphasize the role of countries in choosing

location names, as they tend to introduce political conflict during maintenance, and country information isn't needed for typical uses of the database.

* Theory: Say that names should differ in more than just case, and why; and explain why 'backward' means old names will continue to work. (thanks to Norbert Lindenberg for spotting these issues).

Update citation date and URL.

* iso3166.tab: Mention latest maintenance update.

Update citation URL. Add missing comma for BQ.

Be more consistent about abbreviating Sint like Saint.

Mention SX "Dutch part" for consistency with MF "French part".

* iso3166.tab, zone.tab: Add legal/territorial disclaimer.

* zone.tab: Say that country/zone overlaps can occur in both directions, and that column 2 need not lie within column 1.

(Asia/Jerusalem): Change the coordinates from a sloppy value, taken from an old astrology book, to a more-precise value, the site of city hall. The sloppy value sparked some controversy and the hope is that the more-precise value will be a bit less controversial.

Theory | 27 ++++++

iso3166.tab | 21 ++++++

zone.tab | 17 ++++++

3 files changed, 36 insertions(+),

29 deletions(-)

diff --git a/Theory b/Theory

index b00a492..751b12d 100644

--- a/Theory

+++ b/Theory

@@ -264,12 +264,12 @@ in decreasing order of importance:

TZ strings. A file name component must not exceed 14

characters or start with `-'`. E.g., prefer `Brunei'

to `Bandar_Seri_Begawan'.

- Include at least one location per time zone rule set per country.

- One such location is enough. Use ISO 3166 (see the file

- iso3166.tab) to help decide whether something is a country.

- However, uninhabited ISO 3166 regions like Bouvet Island

+ Do not use names that differ only in case. Although the reference

+ implementation is case-sensitive, some other implementations

+ are not, and they would mishandle names differing only in case.

+ Uninhabited regions like the North Pole and Bouvet Island

do not need locations, since local time is not defined there.

- If all the clocks in a country's region have agreed since 1970,

+ If all the clocks in a region have agreed

since 1970,

don't bother to include more than one location

even if subregions' clocks disagreed before 1970.

Otherwise these tables would become annoyingly large.

@@ -283,7 +283,7 @@ in decreasing order of importance:

Use mainstream English spelling, e.g. prefer `Rome' to `Roma', and prefer `Athens' to the true name (which uses Greek letters).

The POSIX file name restrictions encourage this rule.

- Use the most populous among locations in a country's time zone,

+ Use the most populous among locations in a zone,

e.g. prefer `Shanghai' to `Beijing'. Among locations with similar populations, pick the best-known location,

e.g. prefer `Rome' to `Milan'.

@@ -302,10 +302,11 @@ in decreasing order of importance:

Milan's population has grown to be somewhat greater than Rome's.

If a name is changed, put its old spelling in the `backward' file.

+ This means old spellings will continue to work.

The file `zone.tab' lists the geographical locations used to name time zone rule files. It is intended to be an exhaustive list

-of canonical names for geographic regions.

+of names for geographic regions as described above.

Older versions of this package used a different naming scheme, and these older names are still supported.

@@ -359,14 +360,13 @@ in decreasing order of importance:

If this is not available or is a phrase mentioning the country (e.g. ``Cape Verde Time"), then:

- When a country has a single or principal time zone region,

+ When a country is identified with a single or principal zone,

append `T' to the country's ISO code, e.g. `CVT' for

Cape Verde Time. For summer time append `ST';

for double summer time append `DST'; etc.

- When a country has multiple time zones, take the first three

- letters of an English place name identifying each zone

- and then append `T', `ST', etc. as before;

- e.g. `VLAST' for VLAdivostok Summer Time.

+ Otherwise, take the first three letters of an English place

+ name

identifying each zone and append `T', `ST', etc.

+ as before; e.g. `VLAST' for VLAdivostok Summer Time.

Use UTC (with time zone abbreviation "zzz") for locations while

uninhabited. The "zzz" mnemonic is that these locations are,

@@ -587,7 +587,8 @@ Sources:

Michael Allison and Robert Schmunk,

"Technical Notes on Mars Solar Time as Adopted by the Mars24 Sunclock"

-<<http://www.giss.nasa.gov/tools/mars24/help/notes.html>> (2004-07-30).
+<<http://www.giss.nasa.gov/tools/mars24/help/notes.html>> (2012-08-08).

Jia-Rui Chong, "Workdays Fit for a Martian", Los Angeles Times
+<<http://articles.latimes.com/2004/jan/14/science/sci-marstime14>>
(2004-01-14), pp A1, A20-A21.

diff --git a/iso3166.tab b/iso3166.tab
index b952ca1..c184a81 100644

--- a/iso3166.tab

+++ b/iso3166.tab

@@ -1,16 +1,14 @@

<pre>

ISO 3166 alpha-2 country codes

##

This file is in the public domain, so clarified as of

2009-05-17 by Arthur David Olson.

ISO 3166 alpha-2 country codes

##

From Paul

Eggert (2006-09-27):

From Paul Eggert (2013-05-27):

##

This file contains a table with the following columns:

1. ISO 3166-1 alpha-2 country code, current as of

ISO 3166-1 Newsletter VI-1 (2007-09-21). See:

ISO 3166 Maintenance agency (ISO 3166/MA)

.

ISO 3166-1 Newsletter VI-15 (2013-05-10). See: Updates on ISO 3166

http://www.iso.org/iso/home/standards/country_codes/updates_on_iso_3166.htm

2. The usual English name for the country,

chosen so that alphabetic sorting of subsets produces helpful lists.

This is not the same as the English name in the ISO 3166 tables.

@@ -20,8 +18,9 @@

##

Lines beginning with `#` are comments.

##

From Arthur David Olson (2011-08-17):

Resynchronized today with the ISO 3166 site (adding SS for South Sudan).

This table is intended as an aid for users, to help them select time

zone data appropriate

for their practical needs. It is not intended

to take or endorse any position on legal or territorial claims.

##

##country-

##code country name

@@ -54,7 +53,7 @@ BL St Barthelemy

BM Bermuda

```

BN Brunei
BO Bolivia
-BQ Bonaire Sint Eustatius & Saba
+BQ Bonaire, St Eustatius & Saba
BR Brazil
BS Bahamas
BT Bhutan
@@ -235,7 +234,7 @@ SR Suriname
SS South Sudan
ST Sao Tome & Principe
SV El Salvador
-SX Sint Maarten
+SX St Maarten (Dutch part)
SY Syria
SZ Swaziland
TC Turks & Caicos Is
diff --git a/zone.tab b/zone.tab
index 6b98520..3ec24a7 100644
--- a/zone.tab
+++ b/zone.tab
@@ -1,18 +1,21 @@
-# <pre>
+# TZ zone descriptions
+#
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.
#
-# TZ zone descriptions
-#
-# From Paul Eggert (1996-08-05):
+# From Paul Eggert (2013-05-27):
#
# This file contains a table with the following columns:
# 1. ISO 3166 2-character country code. See the file `iso3166.tab'.
+# This identifies a country
# that overlaps the zone. The country may
+# overlap other zones and the zone may overlap other countries.
# 2. Latitude and longitude of the zone's principal location
# in ISO 6709 sign-degrees-minutes-seconds format,
# either +-DDMM+DDDMM or +-DDMMSS+DDDMMSS,
# first latitude (+ is north), then longitude (+ is east).
+# This location need not lie within the column-1 country.
# 3. Zone name used in value of TZ environment variable.
+# Please see the 'Theory' file for how zone names are chosen.
# 4. Comments; present if and only if the country has multiple rows.
#
# Columns are separated by a single tab.
@@ -22,6 +25,10 @@

```

```

#
# Lines beginning with `#' are comments.
#
+# This table is intended as an aid for users, to help them select time
+# zone data appropriate for their practical needs. It is not intended
+# to take or endorse any position on legal or territorial claims.
+#
#country-
#code coordinates TZ comments
AD +4230+00131 Europe/Andorra
@@
-216,7 +223,7 @@ ID -0002+10920 Asia/Pontianak west & central Borneo
ID -0507+11924 Asia/Makassar east & south Borneo, Sulawesi (Celebes), Bali, Nusa Tenggara, west Timor
ID -0232+14042 Asia/Jayapura west New Guinea (Irian Jaya) & Maluku (Moluccas)
IE +5320-00615 Europe/Dublin
-IL +3146+03514 Asia/Jerusalem
+IL +314650+0351326 Asia/Jerusalem
IM +5409-00428 Europe/Isle_of_Man
IN +2232+08822 Asia/Kolkata
IO -0720+07225 Indian/Chagos
--
1.7.6.5

```

Found in path(s):

```

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/0001-Adjust-commentary-to-try-to-defuse-recent-issues-som.patch
No license file was found, but licenses were detected in source scan.

```

```

/*
** This file is in the public domain, so clarified as of
** 1996-06-05 by Arthur David Olson.
*/

```

Found in path(s):

```

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/private.h
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/difftime.c
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/asctime.c
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/localtime.c
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/tzfile.h
No license file was found, but licenses were detected in source scan.

```

```

/*
* Copyright 2000-2004 Sun Microsystems, Inc. All Rights Reserved.

```

* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.

*

* This code is free software; you can redistribute it and/or modify it
* under the terms of the GNU General Public License version 2 only, as
* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided
* by Sun in the LICENSE file that accompanied this code.

*

* This code is distributed in the hope that it will be useful, but WITHOUT
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
* version 2 for more details (a copy is included in the LICENSE file that
* accompanied this code).

*

* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to
the Free Software Foundation,
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.

*

* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
* CA 95054 USA or visit www.sun.com if you need additional information or
* have any questions.

*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/RuleDay.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/Zone.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/Time.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/BackEnd.java

*

/opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/RuleRec.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/ZoneRec.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/Mappings.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/Month.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/Timezone.java

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/Rule.java

*

/opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/tools/javazic/Main.java

No license file was found, but licenses were detected in source scan.

/*

* Copyright 2000-2006 Sun Microsystems, Inc. All Rights Reserved.
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
*
* This code is free software; you can redistribute it and/or modify it
* under the terms of the GNU General Public License version 2 only, as
* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided
* by Sun in the LICENSE file that accompanied this code.
*
* This code is distributed in the hope that it will be useful, but WITHOUT
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
* version 2 for more details (a copy is included in the LICENSE file that
* accompanied this code).
*
* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to
the Free Software Foundation,
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
*
* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
* CA 95054 USA or visit www.sun.com if you need additional information or
* have any questions.
*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/tools/javazic/Zoneinfo.java
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/util/calendar/ZoneInfoFile.java
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/tools/javazic/Simple.java

No license file was found, but licenses were detected in source scan.

<pre>

This file is in the public domain, so clarified as of
2009-05-17 by Arthur David Olson.

This data is by no means authoritative; if you think you know better,
go ahead and edit the file (and please send any changes to
tz@iana.org for general use in the future).

From Paul Eggert (2013-02-21):

A good source for time zone historical data outside the U.S. is
Thomas G. Shanks and Rique Pottenger, The International Atlas (6th edition),
San Diego: ACS Publications, Inc. (2003).

Gwillim Law writes that a good source
for recent time zone data is the International Air Transport
Association's Standard Schedules Information Manual (IATA SSIM),
published semiannually. Law sent in several helpful summaries
of the IATA's data after 1990.

Except where otherwise noted, Shanks & Pottenger is the source for
entries through 1990, and IATA SSIM is the source for entries afterwards.

Another
source occasionally used is Edward W. Whitman, World Time Differences,
Whitman Publishing Co, 2 Niagara Av, Ealing, London (undated), which
I found in the UCLA library.

For data circa 1899, a common source is:
Milne J. Civil time. Geogr J. 1899 Feb;13(2):173-94
<<http://www.jstor.org/stable/1774359>>.

A reliable and entertaining source about time zones is
Derek Howse, Greenwich time and longitude, Philip Wilson Publishers (1997).

Previous editions of this database used WAT, CAT, SAT, and EAT
for +0:00 through +3:00, respectively,
but Mark R V Murray reports that
`SAST' is the official abbreviation for +2:00 in the country of South Africa,
`CAT' is commonly used for +2:00 in countries north of South Africa, and
`WAT' is probably the best name for +1:00, as the common phrase for
the area that includes Nigeria is ``West Africa".
He has heard of ``Western Sahara Time" for +0:00 but can find no reference.

To make things confusing, `WAT' seems to have
been used for -1:00 long ago;
I'd guess that this was because people needed _some_ name for -1:00,
and at the time, far west Africa was the only major land area in -1:00.
This usage is now obsolete, as the last use of -1:00 on the African
mainland seems to have been 1976 in Western Sahara.

To summarize, the following abbreviations seem to have some currency:
-1:00 WAT West Africa Time (no longer used)
0:00 GMT Greenwich Mean Time
2:00 CAT Central Africa Time
2:00 SAST South Africa Standard Time
and Murray suggests the following abbreviation:

```

# 1:00 WAT West Africa Time
# I realize that this leads to `WAT' being used for both -1:00 and 1:00
# for times before 1976, but this is the best I can think of
# until we get more information.
#
# I invented the following abbreviations; corrections are welcome!
# 2:00 WAST West Africa Summer Time
# 2:30 BEAT British East Africa Time (no longer used)
# 2:45 BEAUT British East Africa Unified Time (no longer used)
#
3:00 CAST Central Africa Summer Time (no longer used)
# 3:00 SAST South Africa Summer Time (no longer used)
# 3:00 EAT East Africa Time
# 4:00 EAST East Africa Summer Time (no longer used)

# Algeria
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Algeria 1916 only - Jun 14 23:00s 1:00 S
Rule Algeria 1916 1919 - Oct Sun>=1 23:00s 0 -
Rule Algeria 1917 only - Mar 24 23:00s 1:00 S
Rule Algeria 1918 only - Mar 9 23:00s 1:00 S
Rule Algeria 1919 only - Mar 1 23:00s 1:00 S
Rule Algeria 1920 only - Feb 14 23:00s 1:00 S
Rule Algeria 1920 only - Oct 23 23:00s 0 -
Rule Algeria 1921 only - Mar 14 23:00s 1:00 S
Rule Algeria 1921 only - Jun 21 23:00s 0 -
Rule Algeria 1939 only - Sep 11 23:00s 1:00 S
Rule Algeria 1939 only - Nov 19 1:00 0 -
Rule Algeria 1944 1945 - Apr Mon>=1 2:00 1:00 S
Rule Algeria 1944 only - Oct 8 2:00 0 -
Rule Algeria 1945 only - Sep 16 1:00 0 -
Rule Algeria 1971 only - Apr 25 23:00s 1:00 S
Rule Algeria 1971 only - Sep 26 23:00s 0 -
Rule Algeria 1977 only - May
6 0:00 1:00 S
Rule Algeria 1977 only - Oct 21 0:00 0 -
Rule Algeria 1978 only - Mar 24 1:00 1:00 S
Rule Algeria 1978 only - Sep 22 3:00 0 -
Rule Algeria 1980 only - Apr 25 0:00 1:00 S
Rule Algeria 1980 only - Oct 31 2:00 0 -
# Shanks & Pottenger give 0:09:20 for Paris Mean Time; go with Howse's
# more precise 0:09:21.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Algiers 0:12:12 - LMT 1891 Mar 15 0:01
0:09:21 - PMT 1911 Mar 11 # Paris Mean Time
0:00 Algeria WE%sT 1940 Feb 25 2:00
1:00 Algeria CE%sT 1946 Oct 7
0:00 - WET 1956 Jan 29

```

1:00 - CET 1963 Apr 14
0:00 Algeria WE%ST 1977 Oct 21
1:00 Algeria CE%ST 1979 Oct 26
0:00 Algeria WE%ST 1981 May
1:00 - CET

Angola
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Luanda 0:52:56 - LMT 1892
0:52:04 - AOT 1911 May 26 # Angola Time
1:00 - WAT

Benin
Whitman says they switched to 1:00 in 1946, not 1934;
go with Shanks & Pottenger.
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Porto-Novo 0:10:28 - LMT 1912
0:00 - GMT 1934
Feb 26
1:00 - WAT

Botswana
From Paul Eggert (2013-02-21):
Milne says they were regulated by the Cape Town Signal in 1899;
assume they switched to 2:00 when Cape Town did.
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Gaborone 1:43:40 - LMT 1885
1:30 - SAST 1903 Mar
2:00 - CAT 1943 Sep 19 2:00
2:00 1:00 CAST 1944 Mar 19 2:00
2:00 - CAT

Burkina Faso
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Ouagadougou -0:06:04 - LMT 1912
0:00 - GMT

Burundi
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Bujumbura 1:57:28 - LMT 1890
2:00 - CAT

Cameroon
Whitman says they switched to 1:00 in 1920; go with Shanks & Pottenger.
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Douala 0:38:48 - LMT 1912
1:00 - WAT

Cape Verde
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Atlantic/Cape_Verde -1:34:04 - LMT 1907 # Praia
-2:00 - CVT 1942 Sep
-2:00 1:00 CVST 1945 Oct 15
-2:00 - CVT 1975
Nov 25 2:00
-1:00 - CVT

Central African Republic
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Bangui 1:14:20 - LMT 1912
1:00 - WAT

Chad
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Ndjamena 1:00:12 - LMT 1912
1:00 - WAT 1979 Oct 14
1:00 1:00 WAST 1980 Mar 8
1:00 - WAT

Comoros
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Indian/Comoro 2:53:04 - LMT 1911 Jul # Moroni, Gran Comoro
3:00 - EAT

Democratic Republic of Congo
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Kinshasa 1:01:12 - LMT 1897 Nov 9
1:00 - WAT
Zone Africa/Lubumbashi 1:49:52 - LMT 1897 Nov 9
2:00 - CAT

Republic of the Congo
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Brazzaville 1:01:08 - LMT 1912
1:00 - WAT

Cote D'Ivoire
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Abidjan -0:16:08 - LMT 1912
0:00 - GMT

Djibouti
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Djibouti 2:52:36 - LMT 1911 Jul
3:00 - EAT

#####

#

Egypt

Milne says Cairo used 2:05:08.9, the local mean time of the Abbasizeh
observatory; round to nearest. Milne also says that the official time for
Egypt was mean noon at the Great Pyramid, 2:04:30.5, but apparently this
did not apply to Cairo, Alexandria, or Port Said.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Egypt 1940 only - Jul 15 0:00 1:00 S

Rule Egypt 1940 only - Oct 1 0:00 0 -

Rule Egypt 1941 only - Apr 15 0:00 1:00 S

Rule Egypt 1941 only - Sep 16 0:00 0 -

Rule Egypt 1942 1944 - Apr 1 0:00 1:00 S

Rule Egypt 1942 only - Oct 27 0:00 0 -

Rule Egypt 1943 1945 - Nov 1 0:00 0 -

Rule Egypt 1945 only - Apr 16 0:00 1:00 S

Rule Egypt 1957 only - May 10 0:00 1:00 S

Rule Egypt 1957 1958 - Oct 1 0:00 0 -

Rule Egypt 1958 only - May 1 0:00 1:00 S

Rule Egypt 1959 1981 - May 1 1:00 1:00 S

Rule Egypt 1959 1965 - Sep 30 3:00 0 -

Rule Egypt 1966 1994 - Oct 1 3:00 0 -

Rule Egypt 1982 only - Jul 25 1:00 1:00 S

Rule Egypt 1983 only - Jul 12 1:00 1:00 S

Rule Egypt 1984 1988 - May

1 1:00 1:00 S

Rule Egypt 1989 only - May 6 1:00 1:00 S

Rule Egypt 1990 1994 - May 1 1:00 1:00 S

IATA (after 1990) says transitions are at 0:00.

Go with IATA starting in 1995, except correct 1995 entry from 09-30 to 09-29.

From Alexander Krivenyshev (2011-04-20):

"...Egypt's interim cabinet decided on Wednesday to cancel daylight
saving time after a poll posted on its website showed the majority of
Egyptians would approve the cancellation."
#

Egypt to cancel daylight saving time

http://www.almazryalyoum.com/en/node/407168

or

http://www.worldtimezone.com/dst_news/dst_news_egypt04.html

Rule Egypt 1995 2010 - Apr lastFri 0:00s 1:00 S

Rule Egypt 1995 2005 - Sep lastThu 23:00s 0 -
 # From Steffen Thorsen (2006-09-19):
 # The Egyptian Gazette, issue 41,090
 (2006-09-18), page 1, reports:
 # Egypt will turn back clocks by one hour at the midnight of Thursday
 # after observing the daylight saving time since May.
 # <http://news.gom.com.eg/gazette/pdf/2006/09/18/01.pdf>
 Rule Egypt 2006 only - Sep 21 23:00s 0 -
 # From Dirk Losch (2007-08-14):
 # I received a mail from an airline which says that the daylight
 # saving time in Egypt will end in the night of 2007-09-06 to 2007-09-07.
 # From Jesper Norgaard Welen (2007-08-15): [The following agree:]
 # <http://www.nentjes.info/Bill/bill5.htm>
 # <http://www.timeanddate.com/worldclock/city.html?n=53>
 # From Steffen Thorsen (2007-09-04): The official information...:
 # <http://www.sis.gov.eg/En/EgyptOnline/Miscellaneous/000002/020700000000000000001580.htm>
 Rule Egypt 2007 only - Sep Thu>=1 23:00s 0 -
 # From Abdelrahman Hassan (2007-09-06):
 # Due to the Hijri (lunar Islamic calendar) year being 11 days shorter
 # than the year of the Gregorian calendar, Ramadan shifts earlier each
 # year. This year it will be observed
 # September 13 (September is quite
 # hot in Egypt), and the idea is to make fasting easier for workers by
 # shifting business hours one hour out of daytime heat. Consequently,
 # unless discontinued, next DST may end Thursday 28 August 2008.
 # From Paul Eggert (2007-08-17):
 # For lack of better info, assume the new rule is last Thursday in August.

 # From Petr Machata (2009-04-06):
 # The following appeared in Red Hat bugzilla[1] (edited):
 #
 # > \$ zdump -v /usr/share/zoneinfo/Africa/Cairo | grep 2009
 # > /usr/share/zoneinfo/Africa/Cairo Thu Apr 23 21:59:59 2009 UTC = Thu =
 # Apr 23
 # > 23:59:59 2009 EET isdst=0 gmtoff=7200
 # > /usr/share/zoneinfo/Africa/Cairo Thu Apr 23 22:00:00 2009 UTC = Fri =
 # Apr 24
 # > 01:00:00 2009 EEST isdst=1 gmtoff=10800
 # > /usr/share/zoneinfo/Africa/Cairo Thu Aug 27 20:59:59 2009 UTC = Thu =
 # Aug 27
 # > 23:59:59 2009 EEST isdst=1 gmtoff=10800
 # > /usr/share/zoneinfo/Africa/Cairo Thu Aug 27 21:00:00 2009 UTC = Thu =
 # Aug 27
 # > 23:00:00 2009 EET isdst=0
 gmtoff=7200
 #
 # > end date should be Thu Sep 24 2009 (Last Thursday in September at 23:59=
 # :59)

```
# > http://support.microsoft.com/kb/958729/
#
# timeanddate[2] and another site I've found[3] also support that.
#
# [1] <a href="https://bugzilla.redhat.com/show_bug.cgi?id=492263">
# https://bugzilla.redhat.com/show_bug.cgi?id=492263
# </a>
# [2] <a href="http://www.timeanddate.com/worldclock/clockchange.html?n=53">
# http://www.timeanddate.com/worldclock/clockchange.html?n=53
# </a>
# [3] <a href="http://wpp.greenwichmeantime.com/time-zone/africa/egypt/">
# http://wpp.greenwichmeantime.com/time-zone/africa/egypt/
# </a>

# From Arthur David Olson (2009-04-20):
# In 2009 (and for the next several years), Ramadan ends before the fourth
# Thursday in September; Egypt is expected to revert to the last Thursday
# in September.

# From Steffen Thorsen (2009-08-11):
# We have been able to confirm the August change with the Egyptian Cabinet
# Information and Decision Support Center:
# <a
# href="http://www.timeanddate.com/news/time/egypt-dst-ends-2009.html">
# http://www.timeanddate.com/news/time/egypt-dst-ends-2009.html
# </a>
#
# The Middle East News Agency
# <a href="http://www.mena.org.eg/index.aspx">
# http://www.mena.org.eg/index.aspx
# </a>
# also reports "Egypt starts winter time on August 21"
# today in article numbered "71, 11/08/2009 12:25 GMT."
# Only the title above is available without a subscription to their service,
# and can be found by searching for "winter" in their search engine
# (at least today).

# From Alexander Krivenyshev (2010-07-20):
# According to News from Egypt - Al-Masry Al-Youm Egypt's cabinet has
# decided that Daylight Saving Time will not be used in Egypt during
# Ramadan.
#
# Arabic translation:
# "Clocks to go back during Ramadan--and then forward again"
# <a href="http://www.almasryalyoum.com/en/news/clocks-go-back-during-ramadan-and-then-forward-again">
# http://www.almasryalyoum.com/en/news/clocks-go-back-during-ramadan-and-then-forward-again
#
```



```
</a>
# or
# <a href="http://www.worldtimezone.com/dst_news/dst_news_egypt02.html">
# http://www.worldtimezone.com/dst_news/dst_news_egypt02.html
# </a>
```

```
Rule Egypt 2008 only - Aug lastThu 23:00s 0 -
Rule Egypt 2009 only - Aug 20 23:00s 0 -
Rule Egypt 2010 only - Aug 11 0:00 0 -
Rule Egypt 2010 only - Sep 10 0:00 1:00 S
Rule Egypt 2010 only - Sep lastThu 23:00s 0 -
```

```
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Cairo 2:05:09 - LMT 1900 Oct
2:00 Egypt EE%sT
```

```
# Equatorial Guinea
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Malabo 0:35:08 - LMT 1912
0:00 - GMT 1963 Dec 15
1:00 - WAT
```

```
# Eritrea
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Asmara 2:35:32 - LMT 1870
2:35:32 - AMT 1890 # Asmara Mean Time
2:35:20 - ADMT 1936 May 5 # Adis Dera MT
3:00 - EAT
```

```
# Ethiopia
# From Paul Eggert (2006-03-22):
# Shanks & Pottenger write that Ethiopia had six narrowly-spaced time zones
# between 1870 and 1890, and that they merged to 38E50
# (2:35:20) in 1890.
# We'll guess that 38E50 is for Adis Dera.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Addis_Ababa 2:34:48 - LMT 1870
2:35:20 - ADMT 1936 May 5 # Adis Dera MT
3:00 - EAT
```

```
# Gabon
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Libreville 0:37:48 - LMT 1912
1:00 - WAT
```

```
# Gambia
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Banjul -1:06:36 - LMT 1912
```

-1:06:36 - BMT 1935 # Banjul Mean Time

-1:00 - WAT 1964

0:00 - GMT

Ghana

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Whitman says DST was observed from 1931 to ``the present";

go with Shanks & Pottenger.

Rule Ghana 1936 1942 - Sep 1 0:00 0:20 GHST

Rule Ghana 1936 1942 - Dec 31 0:00 0 GMT

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Accra -0:00:52 - LMT 1918

0:00 Ghana %s

Guinea

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Conakry -0:54:52 - LMT 1912

0:00 - GMT 1934 Feb 26

-1:00 - WAT 1960

0:00 - GMT

Guinea-Bissau

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Bissau -1:02:20

- LMT 1911 May 26

-1:00 - WAT 1975

0:00 - GMT

Kenya

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Nairobi 2:27:16 - LMT 1928 Jul

3:00 - EAT 1930

2:30 - BEAT 1940

2:45 - BEAUT 1960

3:00 - EAT

Lesotho

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Maseru 1:50:00 - LMT 1903 Mar

2:00 - SAST 1943 Sep 19 2:00

2:00 1:00 SAST 1944 Mar 19 2:00

2:00 - SAST

Liberia

From Paul Eggert (2006-03-22):

In 1972 Liberia was the last country to switch

from a UTC offset that was not a multiple of 15 or 20 minutes.

Howse reports that it was in honor of their president's birthday.

Shank & Pottenger report the date as May 1, whereas Howse reports Jan;
go with Shanks & Pottenger.
For Liberia before 1972, Shanks & Pottenger report -0:44, whereas Howse and
Whitman each report -0:44:30; go with the more precise figure.
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Monrovia -0:43:08 - LMT 1882
-0:43:08
- MMT 1919 Mar # Monrovia Mean Time
-0:44:30 - LRT 1972 May # Liberia Time
0:00 - GMT

#####

Libya

From Even Scharning (2012-11-10):
Libya set their time one hour back at 02:00 on Saturday November 10.
<http://www.libyaherald.com/2012/11/04/clocks-to-go-back-an-hour-on-saturday/>
Here is an official source [in Arabic]: <http://ls.ly/fb6Yc>

Steffen Thorsen forwarded a translation (2012-11-10) in
<http://mm.icann.org/pipermail/tz/2012-November/018451.html>

From Tim Parenti (2012-11-11):
Treat the 2012-11-10 change as a zone change from UTC+2 to UTC+1.
The DST rules planned for 2013 and onward roughly mirror those of Europe
(either two days before them or five days after them, so as to fall on
lastFri instead of lastSun).

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Libya 1951 only - Oct 14 2:00 1:00 S
Rule Libya 1952 only - Jan 1 0:00 0 -
Rule Libya 1953 only - Oct
9 2:00 1:00 S
Rule Libya 1954 only - Jan 1 0:00 0 -
Rule Libya 1955 only - Sep 30 0:00 1:00 S
Rule Libya 1956 only - Jan 1 0:00 0 -
Rule Libya 1982 1984 - Apr 1 0:00 1:00 S
Rule Libya 1982 1985 - Oct 1 0:00 0 -
Rule Libya 1985 only - Apr 6 0:00 1:00 S
Rule Libya 1986 only - Apr 4 0:00 1:00 S
Rule Libya 1986 only - Oct 3 0:00 0 -
Rule Libya 1987 1989 - Apr 1 0:00 1:00 S
Rule Libya 1987 1989 - Oct 1 0:00 0 -
Rule Libya 1997 only - Apr 4 0:00 1:00 S
Rule Libya 1997 only - Oct 4 0:00 0 -
Rule Libya 2013 max - Mar lastFri 1:00 1:00 S
Rule Libya 2013 max - Oct lastFri 2:00 0 -

```

# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Tripoli 0:52:44 - LMT 1920
  1:00 Libya CE%ST 1959
  2:00 - EET 1982
  1:00 Libya CE%ST 1990 May 4
# The 1996 and 1997 entries are from Shanks & Pottenger;
# the IATA SSIM data contain some obvious errors.
  2:00 - EET 1996 Sep 30
  1:00 Libya CE%ST 1997 Oct 4
  2:00 - EET 2012 Nov 10 2:00
  1:00 Libya CE%ST

# Madagascar
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone
Indian/Antananarivo 3:10:04 - LMT 1911 Jul
  3:00 - EAT 1954 Feb 27 23:00s
  3:00 1:00 EAST 1954 May 29 23:00s
  3:00 - EAT

# Malawi
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Blantyre 2:20:00 - LMT 1903 Mar
  2:00 - CAT

# Mali
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Bamako -0:32:00 - LMT 1912
  0:00 - GMT 1934 Feb 26
  -1:00 - WAT 1960 Jun 20
  0:00 - GMT

# Mauritania
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Nouakchott -1:03:48 - LMT 1912
  0:00 - GMT 1934 Feb 26
  -1:00 - WAT 1960 Nov 28
  0:00 - GMT

# Mauritius
# From Steffen Thorsen (2008-06-25):
# Mauritius plans to observe DST from 2008-11-01 to 2009-03-31 on a trial
# basis....
# It seems that Mauritius observed daylight saving time from 1982-10-10 to
# 1983-03-20 as well, but that was not successful....
# http://www.timeanddate.com/news/time/mauritius-daylight-saving-time.html

```

From Alex Krivenyshev (2008-06-25):

http://economicdevelopment.gov.mu/portal/site/Mainhomepage/menuitem.a42b24128104d9845dabddd154508a0c/?content_id=0a7cee8b5d69a110VgnVCM1000000a04a8c0RCRD

From Arthur David Olson (2008-06-30):
The www.timeanddate.com article cited by Steffen Thorsen notes that "A
final decision has yet to be made on the times that daylight saving
would begin and end on these dates." As a place holder, use midnight.

From Paul Eggert (2008-06-30):
Follow Thorsen on DST in 1982/1983, instead of Shanks & Pottenger.

From Steffen Thorsen (2008-07-10):
According to
http://www.lexpress.mu/display_article.php?news_id=111216
http://www.lexpress.mu/display_article.php?news_id=111216
[http://www.lexpress.mu/display_article.php?news_id=111216](#)
(in French), Mauritius will start and end their DST a few days earlier
than previously announced (2008-11-01 to 2009-03-31). The new start
date is 2008-10-26 at 02:00 and the new end date is 2009-03-27 (no time
given, but it is probably at either 2 or 3 wall clock time).

A little strange though, since the article
says that they moved the date
to align itself with Europe and USA which also change time on that date,
but that means they have not paid attention to what happened in
USA/Canada last year (DST ends first Sunday in November). I also wonder
why that they end on a Friday, instead of aligning with Europe which
changes two days later.

From Alex Krivenyshev (2008-07-11):
Seems that English language article "The revival of daylight saving
time: Energy conservation?"-# No. 16578 (07/11/2008) was originally
published on Monday, June 30, 2008...

I guess that article in French "Le gouvernement avance l'introduction
de l'heure d'ete" stating that DST in Mauritius starting on October 26
and ending on March 27, 2009 is the most recent one.
...
http://www.worldtimezone.com/dst_news/dst_news_mauritius02.html
http://www.worldtimezone.com/dst_news/dst_news_mauritius02.html
[http://www.worldtimezone.com/dst_news/dst_news_mauritius02.html](#)

From Riad M. Hossen Ally (2008-08-03):
The Government of Mauritius weblink
#

http://www.gov.mu/portal/site/pmosite/menuitem.4ca0efdee47462e7440a600248a521ca/?content_id=4728ca68b2a5b110VgnVCM1000000a04a8c0RCRD

Cabinet Decision of July 18th, 2008 states as follows:

4. ...Cabinet has agreed to the introduction into the National Assembly
of the Time Bill which provides for the introduction of summer time in
Mauritius. The summer time period which will be of one hour ahead of
the standard time, will be aligned with that in Europe and the United
States of America. It will start at two o'clock in the morning on the
last Sunday of October and will end at two o'clock in the morning on
the last Sunday of March the following year. The summer time for the
year 2008 - 2009 will, therefore, be effective as from 26 October 2008
and end on 29 March 2009.

From Ed Maste (2008-10-07):
THE TIME BILL (No.
XXVII of 2008) Explanatory Memorandum states the
beginning / ending of summer time is 2 o'clock standard time in the
morning of the last Sunday of October / last Sunday of March.

http://www.gov.mu/portal/goc/assemblysite/file/bill2708.pdf

From Steffen Thorsen (2009-06-05):
According to several sources, Mauritius will not continue to observe
DST the coming summer...

Some sources, in French:

http://www.defimedia.info/news/946/Rashid-Beebeejaun---%C2%AB-L%E2%80%99heure-d%E2%80%99%C3%A9t%C3%A9-ne-sera-pas-appliqu%C3%A9-cette-ann%C3%A9-%C2%BB

http://lexpress.mu/Story/3398~Beebeejaun---Les-objectifs-d-%C3%A9conomie-d-%C3%A9nergie-de-l-heure-d-%C3%A9t%C3%A9-ont-%C3%A9t%C3%A9-atteints-

Our wrap-up:

http://www.timeanddate.com/news/time/mauritius-dst-will-not-repeat.html

```

# </a>

# From Arthur David Olson (2009-07-11):
# The "mauritius-dst-will-not-repeat" wrapup includes this:
# "The trial ended on March 29, 2009, when the clocks moved back by one hour
# at 2am (or 02:00) local time..."

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Mauritius 1982 only - Oct 10 0:00 1:00 S
Rule Mauritius 1983 only - Mar 21 0:00 0 -
Rule Mauritius 2008 only - Oct lastSun 2:00 1:00 S
Rule Mauritius 2009 only - Mar lastSun 2:00 0 -
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Indian/Mauritius 3:50:00 - LMT 1907 # Port Louis
    4:00 Mauritius MU%ST # Mauritius Time
# Agalega Is, Rodriguez
# no information; probably like Indian/Mauritius

# Mayotte
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Indian/Mayotte 3:00:56
    - LMT 1911 Jul # Mamoutzou
    3:00 - EAT

# Morocco
# See the `europe' file for Spanish Morocco (Africa/Ceuta).

# From Alex Krivenyshev (2008-05-09):
# Here is an article that Morocco plan to introduce Daylight Saving Time between
# 1 June, 2008 and 27 September, 2008.
#
# "... Morocco is to save energy by adjusting its clock during summer so it will
# be one hour ahead of GMT between 1 June and 27 September, according to
# Communication Minister and Government Spokesman, Khalid Naciri..."
#
# <a href="http://www.worldtimezone.net/dst_news/dst_news_morocco01.html">
# http://www.worldtimezone.net/dst_news/dst_news_morocco01.html
# </a>
# OR
# <a href="http://en.afrik.com/news11892.html">
# http://en.afrik.com/news11892.html
# </a>

# From Alex Krivenyshev (2008-05-09):
# The Morocco time change can be confirmed on Morocco web site Maghreb Arabe Presse:
# <a href="http://www.map.ma/eng/sections/box3/morocco_shifts_to_da/view">
# http://www.map.ma/eng/sections/box3/morocco_shifts_to_da/view
#

```


#

Morocco shifts to daylight time on June 1st through September 27, Govt.
spokesman.

From Patrice Scattolin (2008-05-09):

According to this article:

http://www.avmaroc.com/actualite/heure-dete-comment-a127896.html

(and republished here:

http://www.actu.ma/heure-dete-comment_i127896_0.html

)

the changes occurs at midnight:

#

saturday night may 31st at midnight (which in french is to be

interpreted as the night between saturday and sunday)

sunday night the 28th at midnight

#

Seeing that the 28th is monday, I am guessing that she intends to say

the midnight of the 28th which is the midnight between sunday and

monday, which jives with other sources that say that it's inclusive

june 1st to sept 27th.

#

The decision was taken by decree *2-08-224

*but I can't find the decree

published on the web.

#

It's also confirmed here:

http://www.maroc.ma/NR/exeres/FACF141F-D910-44B0-B7FA-6E03733425D1.htm

on a government portal as being between june 1st and sept 27th (not yet

posted in english).

#

The following google query will generate many relevant hits:

http://www.google.com/search?hl=en&q=Conseil+de+gouvernement+maroc+heure+avance&btnG=Search

From Alex Krivenyshev (2008-05-09):

Is Western Sahara (part which administrated by Morocco) going to follow

Morocco DST changes? Any information? What about other part of

Western Sahara - under administration of POLISARIO Front (also named

SADR Saharawi Arab Democratic Republic)?

From Arthur David Olson (2008-05-09):
XXX--guess that it is only Morocco for
now; guess only 2008 for now.

From Steffen Thorsen (2008-08-27):
Morocco will change the clocks back on the midnight between August 31
and September 1. They originally planned to observe DST to near the end
of September:

One article about it (in French):
<a
href="http://www.menara.ma/fr/Actualites/Maroc/Societe/ci.retour_a_1_heure_gmt_a_partir_du_dimanche_31_aout
_a_minuit_officiel_.default">

http://www.menara.ma/fr/Actualites/Maroc/Societe/ci.retour_a_1_heure_gmt_a_partir_du_dimanche_31_aout_a_mi
nuit_officiel_.default

We have some further details posted here:

http://www.timeanddate.com/news/time/morocco-ends-dst-early-2008.html

From Steffen Thorsen (2009-03-17):
Morocco will observe DST from 2009-06-01 00:00 to 2009-08-21 00:00 according
to many sources, such as

http://news.marweb.com/morocco/entertainment/morocco-daylight-saving.html

http://www.mediasat.ma/fr/depeche.aspx?idp=2312

(French)

Our summary:

http://www.timeanddate.com/news/time/morocco-starts-dst-2009.html

From Alexander Krivenyshev (2009-03-17):
Here is a link to official document from Royaume du Maroc Premier Ministre,
Ministere de la Modernisation des Secteurs Publics

Under Article 1 of Royal Decree No. 455-67 of Act 23 safar 1387 (2 june 1967)
concerning the amendment of the legal time, the Ministry of Modernization of
Public Sectors announced that the official time in the Kingdom will be

advanced 60 minutes from Sunday 31 May 2009 at midnight.

http://www.mmsp.gov.ma/francais/Actualites_fr/PDF_Actualites_Fr/HeureEte_FR.pdf

http://www.worldtimezone.com/dst_news/dst_news_morocco03.html

From Steffen Thorsen (2010-04-13):
Several news media in Morocco report that the Ministry of Modernization
of Public Sectors has announced that Morocco will have DST from
2010-05-02 to 2010-08-08.

Example:

http://www.lavieeco.com/actualites/4099-le-maroc-passera-a-l-heure-d-ete-gmt1-le-2-mai.html

(French)
Our page:

http://www.timeanddate.com/news/time/morocco-starts-dst-2010.html

From Dan Abitol (2011-03-30):
...Rules for Africa/Casablanca are the following (24h format)
The 3rd april 2011 at 00:00:00, [it] will be 3rd april 1:00:00
The 31th july 2011 at 00:59:59, [it] will be 31th July 00:00:00

...Official links of change in morocco
The change was broadcast on the FM Radio
I ve called ANRT (telecom regulations in Morocco) at
+212.537.71.84.00

http://www.anrt.net.ma/fr/

They said that

http://www.map.ma/fr/sections/accueil/l_heure_legale_au_ma/view

is the official publication to look at.
They said that the decision was already taken.

More articles in the press

http://www.yabiladi.com/articles/details/5058/secret-l-heure-d-ete-maroc-lev

e.html

http://www.lematin.ma/Actualite/Express/Article.asp?id=148923

http://www.lavieeco.com/actualite/Le-Maroc-passe-sur-GMT%2B1-a-partir-de-dim

anche-prochain-5538.html

From Petr Machata (2011-03-30):
They have it written in English here:

http://www.map.ma/eng/sections/home/morocco_to_spring_fo/view

#

It says there that "Morocco will resume its standard time on July 31,
2011 at midnight." Now they don't say whether they mean midnight of
wall clock time (i.e. 11pm UTC), but that's what I would assume. It has
also been like that in the past.

From Alexander Krivenyshev (2012-03-09):
According to Infomédiaire web site from Morocco (infomediaire.ma),
on March 9, 2012, (in French) Heure l'heure d'été;
Le Maroc adopte officiellement l'heure d'été;

http://www.infomediaire.ma/news/maroc/heure-1%C3%A9gale-le-maroc-adopte-officiellement-lheure-d%C3%A9t%C3%A9

Governing Council adopted draft decree, that Morocco DST starts on
the last Sunday of March (March 25, 2012) and ends on
last Sunday of September (September 30, 2012)
except the month of Ramadan.
or (brief)

http://www.worldtimezone.com/dst_news/dst_news_morocco06.html

From Arthur David Olson (2012-03-10):
The infomediaire.ma source indicates that the system is to be in
effect every year. It gives 03H00 as the "fall back" time of day;
it lacks a "spring forward" time of day; assume 2:00 XXX.
Wait on specifying the Ramadan exception for details about
start date, start time of day, end date, and end time of day XXX.

```

# From Christophe Tropamer (2012-03-16):
# Seen Morocco change again:
# <a href="http://www.le2uminutes.com/actualite.php">
# http://www.le2uminutes.com/actualite.php
# </a>
# "...&agrave; partir du dernier dimance d'avril et non fins mars,
# comme annonc&eacute;
# pr&eacute;c&eacute;demment."

# From Milamber Space Network (2012-07-17):
# The official return to GMT is announced by the Moroccan government:
# <a href="http://www.mmsp.gov.ma/fr/actualites.aspx?id=288">
# http://www.mmsp.gov.ma/fr/actualites.aspx?id=288 [in French]
# </a>
#
# Google translation, lightly edited:
# Back to the standard time of the Kingdom (GMT)
# Pursuant to Decree No. 2-12-126 issued on 26 Jumada (I) 1433 (April 18,
# 2012) and in accordance with the order of Mr. President of the
# Government No. 3-47-12 issued on 24 Sha'ban (11 July 2012), the Ministry
# of Public Service and Administration Modernization announces the return
# of the legal time of the Kingdom (GMT) from Friday, July 20, 2012 until
# Monday, August 20, 2012. So the time will be delayed by 60 minutes from
# 3:00 am Friday, July 20, 2012 and will again be advanced by 60 minutes
# August 20, 2012 from 2:00 am.

# From Paul Eggert (2013-03-06):
# Morocco's daylight-saving transitions due to Ramadan seem
# to be
# announced a bit in advance. On 2012-07-11 the Moroccan government
# announced that year's Ramadan daylight-saving transitions would be
# 2012-07-20 and 2012-08-20; see
# <http://www.mmsp.gov.ma/fr/actualites.aspx?id=288>.
#
# To estimate what the Moroccan government will do in future years,
# transition dates for 2013 through 2021 were determined by running
# the following program under GNU Emacs 24.3:
#
# (let ((islamic-year 1434))
# (while (< islamic-year 1444)
# (let ((a
# (calendar-gregorian-from-absolute
# (calendar-islamic-to-absolute (list 9 1 islamic-year))))
# (b
# (calendar-gregorian-from-absolute
# (calendar-islamic-to-absolute (list 10 1 islamic-year))))))
# (insert
# (format

```

```

# (concat "Rule\tMorocco\t%d\tonly\t-\t%s\t %2d\t 3:00\t0\t-\n"
# "Rule\tMorocco\t%d\tonly\t-\t%s\t %2d\t 2:00\t1:00\tS\n")
# (car (cdr (cdr a))) (calendar-month-name (car a) t) (car (cdr a))
# (car (cdr (cdr b))) (calendar-month-name (car b) t) (car (cdr
b))))
# (setq islamic-year (+ 1 islamic-year)))
#
# with the results hand-edited for 2020-2022, when the normal spring-forward
# date falls during the estimated Ramadan.
#
# From 2023 through 2038 Ramadan is not predicted to overlap with
# daylight saving time. Starting in 2039 there will be overlap again,
# but 32-bit time_t values roll around in 2038 so for now do not worry
# about dates after 2038.

```

```
# RULE NAME FROM TO TYPE IN ON AT SAVE LETTER/S
```

```

Rule Morocco 1939 only - Sep 12 0:00 1:00 S
Rule Morocco 1939 only - Nov 19 0:00 0 -
Rule Morocco 1940 only - Feb 25 0:00 1:00 S
Rule Morocco 1945 only - Nov 18 0:00 0 -
Rule Morocco 1950 only - Jun 11 0:00 1:00 S
Rule Morocco 1950 only - Oct 29 0:00 0 -
Rule Morocco 1967 only - Jun 3 12:00 1:00 S
Rule Morocco 1967 only - Oct 1 0:00 0 -
Rule Morocco 1974 only - Jun 24 0:00 1:00 S
Rule Morocco 1974 only - Sep 1 0:00 0 -
Rule Morocco 1976 1977 - May 1 0:00 1:00 S
Rule Morocco 1976 only - Aug 1 0:00 0 -
Rule Morocco 1977 only - Sep 28
0:00 0 -
Rule Morocco 1978 only - Jun 1 0:00 1:00 S
Rule Morocco 1978 only - Aug 4 0:00 0 -
Rule Morocco 2008 only - Jun 1 0:00 1:00 S
Rule Morocco 2008 only - Sep 1 0:00 0 -
Rule Morocco 2009 only - Jun 1 0:00 1:00 S
Rule Morocco 2009 only - Aug 21 0:00 0 -
Rule Morocco 2010 only - May 2 0:00 1:00 S
Rule Morocco 2010 only - Aug 8 0:00 0 -
Rule Morocco 2011 only - Apr 3 0:00 1:00 S
Rule Morocco 2011 only - Jul 31 0 0 -
Rule Morocco 2012 2019 - Apr lastSun 2:00 1:00 S
Rule Morocco 2012 max - Sep lastSun 3:00 0 -
Rule Morocco 2012 only - Jul 20 3:00 0 -
Rule Morocco 2012 only - Aug 20 2:00 1:00 S
Rule Morocco 2013 only - Jul 9 3:00 0 -
Rule Morocco 2013 only - Aug 8 2:00 1:00 S
Rule Morocco 2014 only - Jun 29 3:00 0 -

```

Rule Morocco 2014 only - Jul 29 2:00 1:00 S
Rule Morocco 2015 only - Jun 18 3:00 0 -
Rule Morocco 2015 only - Jul 18 2:00 1:00 S
Rule Morocco 2016 only - Jun 7 3:00 0 -
Rule Morocco 2016 only - Jul 7 2:00 1:00 S
Rule Morocco 2017 only - May
27 3:00 0 -
Rule Morocco 2017 only - Jun 26 2:00 1:00 S
Rule Morocco 2018 only - May 16 3:00 0 -
Rule Morocco 2018 only - Jun 15 2:00 1:00 S
Rule Morocco 2019 only - May 6 3:00 0 -
Rule Morocco 2019 only - Jun 5 2:00 1:00 S
Rule Morocco 2020 only - May 24 2:00 1:00 S
Rule Morocco 2021 only - May 13 2:00 1:00 S
Rule Morocco 2022 only - May 3 2:00 1:00 S
Rule Morocco 2023 max - Apr lastSun 2:00 1:00 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Casablanca -0:30:20 - LMT 1913 Oct 26

0:00 Morocco WE%ST 1984 Mar 16

1:00 - CET 1986

0:00 Morocco WE%ST

Western Sahara

Zone Africa/El_Aaiun -0:52:48 - LMT 1934 Jan

-1:00 - WAT 1976 Apr 14

0:00 - WET

Mozambique

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Maputo 2:10:20 - LMT 1903 Mar

2:00 - CAT

Namibia

The 1994-04-03 transition is from Shanks & Pottenger.

Shanks & Pottenger report no DST after 1998-04; go with IATA.

From Petronella Sibeene

(2007-03-30) in

<<http://allafrica.com/stories/200703300178.html>>:

While the entire country changes its time, Katima Mulilo and other

settlements in Caprivi unofficially will not because the sun there

rises and sets earlier compared to other regions. Chief of

Forecasting Riaan van Zyl explained that the far eastern parts of

the country are close to 40 minutes earlier in sunrise than the rest

of the country.

#

From Paul Eggert (2007-03-31):

Apparently the Caprivi Strip informally observes Botswana time, but

we have no details. In the meantime people there can use Africa/Gaborone.

RULE NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Namibia 1994 max - Sep Sun>=1 2:00 1:00 S

Rule Namibia 1995 max - Apr Sun>=1 2:00 0 -

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Windhoek 1:08:24 - LMT 1892 Feb 8

1:30 - SWAT 1903 Mar # SW Africa Time

2:00 - SAST 1942 Sep 20 2:00

2:00 1:00 SAST 1943 Mar 21 2:00

2:00 - SAST 1990 Mar 21 # independence

2:00 - CAT 1994

Apr 3

1:00 Namibia WA%sT

Niger

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Niamey 0:08:28 - LMT 1912

-1:00 - WAT 1934 Feb 26

0:00 - GMT 1960

1:00 - WAT

Nigeria

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Lagos 0:13:36 - LMT 1919 Sep

1:00 - WAT

Reunion

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Indian/Reunion 3:41:52 - LMT 1911 Jun # Saint-Denis

4:00 - RET # Reunion Time

#

Scattered Islands (Iles Eparses) administered from Reunion are as follows.

The following information about them is taken from

Iles Eparses (www.outre-mer.gouv.fr/domtom/ile.htm, 1997-07-22, in French;

no longer available as of 1999-08-17).

We have no info about their time zone histories.

#

Bassas da India - uninhabited

Europa Island - inhabited from 1905 to 1910 by two families

Glorioso Is - inhabited until at least 1958

Juan de Nova - uninhabited

Tromelin - inhabited until at least 1958

Rwanda

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Kigali 2:00:16

- LMT 1935 Jun

2:00 - CAT

St Helena

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Atlantic/St_Helena -0:22:48 - LMT 1890 # Jamestown

-0:22:48 - JMT 1951 # Jamestown Mean Time

0:00 - GMT

The other parts of the St Helena territory are similar:

Tristan da Cunha: on GMT, say Whitman and the CIA

Ascension: on GMT, says usno1995 and the CIA

Gough (scientific station since 1955; sealers wintered previously):

on GMT, says the CIA

Inaccessible, Nightingale: no information, but probably GMT

Sao Tome and Principe

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Sao_Tome 0:26:56 - LMT 1884

-0:36:32 - LMT 1912 # Lisbon Mean Time

0:00 - GMT

Senegal

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Dakar -1:09:44 - LMT 1912

-1:00 - WAT 1941 Jun

0:00 - GMT

Seychelles

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Indian/Mahe 3:41:48 - LMT 1906 Jun # Victoria

4:00 - SCT # Seychelles Time

From Paul Eggert (2001-05-30):

#

Aldabra, Farquhar, and Desroches, originally dependencies of the

Seychelles, were transferred to the British Indian Ocean Territory

in 1965 and returned to Seychelles control in 1976. We don't know

whether this affected their time zone, so omit this for now.

Possibly the islands were uninhabited.

Sierra Leone

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Whitman gives Mar 31 - Aug 31 for 1931 on; go with Shanks & Pottenger.

Rule SL 1935 1942 - Jun 1 0:00 0:40 SLST

Rule SL 1935 1942 - Oct 1 0:00 0 WAT

Rule SL 1957 1962 - Jun 1 0:00 1:00 SLST

Rule SL 1957 1962 - Sep 1 0:00 0 GMT

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Freetown -0:53:00 - LMT 1882

-0:53:00 - FMT 1913 Jun # Freetown Mean Time

-1:00 SL %s 1957

0:00 SL %s

Somalia

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Mogadishu 3:01:28 - LMT 1893 Nov

3:00 - EAT 1931

2:30 - BEAT 1957

3:00 - EAT

South Africa

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule SA 1942 1943 - Sep Sun>=15 2:00 1:00 -

Rule SA 1943 1944 - Mar Sun>=15 2:00 0 -

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Johannesburg 1:52:00 - LMT 1892 Feb 8

1:30 - SAST 1903 Mar

2:00 SA SAST

Marion and Prince Edward Is

scientific station since 1947

no information

Sudan

#

From

Sudan News Agency (2000-01-13)

, also reported by Michael De Beukelaer-Dossche via Steffen Thorsen:

Clocks will be moved ahead for 60 minutes all over the Sudan as of noon

Saturday.... This was announced Thursday by Caretaker State Minister for

Manpower Abdul-Rahman Nur-Eddin.

#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Sudan 1970 only - May 1 0:00 1:00 S

Rule Sudan 1970 1985 - Oct 15 0:00 0 -

Rule Sudan 1971 only - Apr 30 0:00 1:00 S

Rule Sudan 1972 1985 - Apr lastSun 0:00 1:00 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Khartoum 2:10:08 - LMT 1931

2:00 Sudan CA%sT 2000 Jan 15 12:00

3:00 - EAT

South

Sudan

Zone Africa/Juba 2:06:24 - LMT 1931

2:00 Sudan CA%sT 2000 Jan 15 12:00

3:00 - EAT

```

# Swaziland
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Mbabane 2:04:24 - LMT 1903 Mar
  2:00 - SAST

# Tanzania
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Dar_es_Salaam 2:37:08 - LMT 1931
  3:00 - EAT 1948
  2:45 - BEAUT 1961
  3:00 - EAT

# Togo
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Lome 0:04:52 - LMT 1893
  0:00 - GMT

# Tunisia

# From Gwillim Law (2005-04-30):
# My correspondent, Risto Nykanen, has alerted me to another adoption of DST,
# this time in Tunisia. According to Yahoo France News
# <http://fr.news.yahoo.com/050426/5/4dumk.html>, in a story attributed to AP
# and dated 2005-04-26, "Tunisia has decided to advance its official time by
# one hour, starting on Sunday, May 1. Henceforth, Tunisian time will be
# UTC+2 instead of UTC+1. The change will take place at 23:00 UTC next
# Saturday." (My translation)
#
# From Oscar van Vlijmen (2005-05-02):
#
# LaPresse, the first national daily newspaper ...
# <http://www.lapresse.tn/archives/archives280405/actualites/lheure.html>
# ... DST for 2005: on: Sun May 1 0h standard time, off: Fri Sept. 30,
# 1h standard time.
#
# From Atef Loukil (2006-03-28):
# The daylight saving time will be the same each year:
# Beginning : the last Sunday of March at 02:00
# Ending : the last Sunday of October at 03:00 ...
# http://www.tap.info.tn/en/index.php?option=com_content&task=view&id=1188&Itemid=50

# From Steffen Thorsen (2009-03-16):
# According to several news sources, Tunisia will not observe DST this year.
# (Arabic)
# <a href="http://www.elbashayer.com/?page=viewn&nid=42546">
# http://www.elbashayer.com/?page=viewn&nid=42546
# </a>

```


http://www.babnet.net/kiwidetail-15295.asp

We have also confirmed this with the US embassy in Tunisia.
We have a wrap-up about this on the following page:

http://www.timeanddate.com/news/time/tunisia-cancels-dst-2009.html

From Alexander Krivenyshev (2009-03-17):
Here is a link to Tunis Afrique Presse News Agency

Standard time to be kept the whole year long (tap.info.tn):

(in English)

http://www.tap.info.tn/en/index.php?option=com_content&task=view&id=26813&Itemid=157

(in Arabic)

http://www.tap.info.tn/ar/index.php?option=com_content&task=view&id=61240&Itemid=1

From Arthur David Olson (2009--3-18):
The Tunis Afrique Presse News Agency notice contains this: "This measure is due to the fact
that the fasting month of ramadan coincides with the period concerned by summer time.
Therefore, the standard time will be kept unchanged the whole
year long."
So foregoing DST seems to be an exception (albeit one that may be repeated in the future).

From Alexander Krivenyshev (2010-03-27):
According to some news reports Tunis confirmed not to use DST in 2010

(translation):
"The Tunisian government has decided to abandon DST, which was scheduled on
Sunday...
Tunisian authorities had suspended the DST for the first time last year also
coincided with the month of Ramadan..."

(in Arabic)

http://www.moheet.com/show_news.aspx?nid=358861&pg=1

http://www.almadenahnews.com/newss/news.php?c=118&id=38036
or

http://www.worldtimezone.com/dst_news/dst_news_tunis02.html

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Tunisia 1939 only - Apr 15 23:00s 1:00 S

Rule Tunisia 1939 only - Nov 18 23:00s 0 -

Rule Tunisia 1940 only - Feb 25 23:00s 1:00 S

Rule Tunisia 1941 only - Oct

6 0:00 0 -

Rule Tunisia 1942 only - Mar 9 0:00 1:00 S

Rule Tunisia 1942 only - Nov 2 3:00 0 -

Rule Tunisia 1943 only - Mar 29 2:00 1:00 S

Rule Tunisia 1943 only - Apr 17 2:00 0 -

Rule Tunisia 1943 only - Apr 25 2:00 1:00 S

Rule Tunisia 1943 only - Oct 4 2:00 0 -

Rule Tunisia 1944 1945 - Apr Mon>=1 2:00 1:00 S

Rule Tunisia 1944 only - Oct 8 0:00 0 -

Rule Tunisia 1945 only - Sep 16 0:00 0 -

Rule Tunisia 1977 only - Apr 30 0:00s 1:00 S

Rule Tunisia 1977 only - Sep 24 0:00s 0 -

Rule Tunisia 1978 only - May 1 0:00s 1:00 S

Rule Tunisia 1978 only - Oct 1 0:00s 0 -

Rule Tunisia 1988 only - Jun 1 0:00s 1:00 S

Rule Tunisia 1988 1990 - Sep lastSun 0:00s 0 -

Rule Tunisia 1989 only - Mar 26 0:00s 1:00 S

Rule Tunisia 1990 only - May 1 0:00s 1:00 S

Rule Tunisia 2005 only - May 1 0:00s 1:00 S

Rule Tunisia 2005 only - Sep 30 1:00s 0 -

Rule Tunisia 2006 2008 - Mar lastSun 2:00s 1:00 S

Rule Tunisia 2006 2008 - Oct lastSun

2:00s 0 -

Shanks & Pottenger give 0:09:20 for Paris Mean Time; go with Howse's

more precise 0:09:21.

Shanks & Pottenger say the 1911 switch was on Mar 9; go with Howse's Mar 11.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Tunis 0:40:44 - LMT 1881 May 12

0:09:21 - PMT 1911 Mar 11 # Paris Mean Time

1:00 Tunisia CE%ST

Uganda

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Africa/Kampala 2:09:40 - LMT 1928 Jul

3:00 - EAT 1930

2:30 - BEAT 1948

2:45 - BEAUT 1957

3:00 - EAT

```
# Zambia
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Lusaka 1:53:08 - LMT 1903 Mar
    2:00 - CAT
```

```
# Zimbabwe
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Africa/Harare 2:04:12 - LMT 1903 Mar
    2:00 - CAT
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/africa
No license file was found, but licenses were detected in source scan.
```

.\ " This file is in the public domain, so clarified as of

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/tzselect.8
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/zic.8
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/time2posix.3
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/date.1
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/newctime.3
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/zdump.8
*
/opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/tzfile.5
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/newtzset.3
No license file was found, but licenses were detected in source scan.
```

/*

```
* Copyright 2003-2005 Sun Microsystems, Inc. All Rights Reserved.
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
*
* This code is free software; you can redistribute it and/or modify it
* under the terms of the GNU General Public License version 2 only, as
* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided
* by Sun in the LICENSE file that accompanied this code.
*
* This code is distributed in the hope that it will be useful, but WITHOUT
```

* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
 * FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
 * version 2 for more details (a copy is included in the LICENSE file that
 * accompanied this code).
 *
 * You should have received a copy of the GNU General Public License version
 * 2 along with this work; if not, write to
 the Free Software Foundation,
 * Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
 *
 * Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
 * CA 95054 USA or visit www.sun.com if you need additional information or
 * have any questions.
 */

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/util/calendar/Era.java
 * /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/util/calendar/JulianCalendar.java
 No license file was found, but licenses were detected in source scan.

#!/usr/bin/perl -w

Courtesy Ken Pizzini.

use strict;

#This file released to the public domain.

#Note: error checking is poor --- only trust the output if the input
 #has been checked by zic.

```
my $contZone = "";
while (<>) {
  my $origline = $_;
  my @fields = ();
  while (s/^\s*((?:"[^"]*"|'[\s#]')+)//) {
    push @fields, $1;
  }
  next unless @fields;

  my $type = lc($fields[0]);
  if ($contZone) {
    @fields >= 3 or warn "bad continuation line";
    unshift @fields, '+', $contZone;
    $type = 'zone';
  }
}
```

```

$contZone = "";
if ($type eq 'zone') {
  # Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]
  my $nfields = @fields;
  $nfields >= 5 or warn "bad zone line";
  if ($nfields > 6) {
    #this splice is optional, depending on one's preference
    #(one big date-time field, or componentized date and time):
    splice(@fields, 5, $nfields-5, "@fields[5..$nfields-1]");
  }
  $contZone = $fields[1]
}
if @fields > 5;
} elsif ($type eq 'rule') {
  # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
  @fields == 10 or warn "bad rule line";
} elsif ($type eq 'link') {
  # Link LINK-FROM LINK-TO
  @fields == 3 or warn "bad link line";
} elsif ($type eq 'leap') {
  # Leap YEAR MONTH DAY HH:MM:SS CORR R/S
  @fields == 7 or warn "bad leap line";
} else {
  warn "Fubar at input line $.: $origline";
}
print join("\t", @fields), "\n";
}

```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/zoneinfo2tdf.pl
```

No license file was found, but licenses were detected in source scan.

/*

```

* Copyright 2005 Sun Microsystems, Inc. All Rights Reserved.
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
*
* This code is free software; you can redistribute it and/or modify it
* under the terms of the GNU General Public License version 2 only, as
* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided
* by Sun in the LICENSE file that accompanied this code.
*
* This code is distributed in the hope that it will be useful, but WITHOUT
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
* version 2 for more details (a copy is included in the LICENSE file that
* accompanied this code).

```

*
* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to the Free
Software Foundation,
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
*
* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
* CA 95054 USA or visit www.sun.com if you need additional information or
* have any questions.
*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/util/calendar/LocalGregorianCalendar.java
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/util/calendar/ImmutableGregorianCalendar.java
No license file was found, but licenses were detected in source scan.

/*
* Copyright (c) 1985, 1987, 1988 The Regents of the University of California.
* All rights reserved.
*
* Redistribution and use in source and binary forms are permitted
* provided that the above copyright notice and this paragraph are
* duplicated in all such forms and that any documentation,
* advertising materials, and other materials related to such
* distribution and use acknowledge that the software was developed
* by the University of California, Berkeley. The name of the
* University may not be used to endorse or promote products derived
* from this software without specific prior written permission.
* THIS SOFTWARE IS PROVIDED ``AS IS" AND WITHOUT ANY EXPRESS OR
* IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED
* WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/date.c
No license file was found, but licenses were detected in source scan.

General Public License (<abbr
title="General Public License">GPL</abbr>.
is either proprietary or an <abbr
<abbr>GNU</abbr> Lesser General Public License
(<abbr title="Lesser General Public License">LGPL</abbr>,
world time zone boundaries distributed under the
Zones of the United States in the public domain.
This file is in the public domain, so clarified as of

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/tz-link.htm
```

No license file was found, but licenses were detected in source scan.

```
# <pre>
```

```
# This file is in the public domain, so clarified as of
```

```
# 2009-05-17 by Arthur David Olson.
```

```
# ISO 3166 alpha-2 country codes
```

```
#
```

```
# From Paul Eggert (2006-09-27):
```

```
#
```

```
# This file contains a table with the following columns:
```

```
# 1. ISO 3166-1 alpha-2 country code, current as of
```

```
# ISO 3166-1 Newsletter VI-1 (2007-09-21). See:
```

```
# <a href="http://www.iso.org/iso/en/prods-services/iso3166ma/index.html">
```

```
# ISO 3166 Maintenance agency (ISO 3166/MA)
```

```
# </a>.
```

```
# 2. The usual English name for the country,
```

```
# chosen so that alphabetic sorting of subsets produces helpful lists.
```

```
# This is not the same as the English name in the ISO 3166 tables.
```

```
#
```

```
# Columns are separated by a single tab.
```

```
# The table is sorted by country code.
```

```
#
```

```
# Lines beginning with `#' are comments.
```

```
#
```

```
# From Arthur David Olson (2011-08-17):
```

```
# Resynchronized today with the ISO 3166 site (adding SS for South Sudan).
```

```
#
```

```
#country-
```

```
#code country
```

```
name
```

```
AD Andorra
```

```
AE United Arab Emirates
```

```
AF Afghanistan
```

```
AG Antigua & Barbuda
```

```
AI Anguilla
```

```
AL Albania
```

```
AM Armenia
```

```
AO Angola
```

```
AQ Antarctica
```

```
AR Argentina
```

```
AS Samoa (American)
```

```
AT Austria
```

```
AU Australia
```

```
AW Aruba
```

AX Aaland Islands
AZ Azerbaijan
BA Bosnia & Herzegovina
BB Barbados
BD Bangladesh
BE Belgium
BF Burkina Faso
BG Bulgaria
BH Bahrain
BI Burundi
BJ Benin
BL St Barthelemy
BM Bermuda
BN Brunei
BO Bolivia
BQ Bonaire Sint Eustatius & Saba
BR Brazil
BS Bahamas
BT Bhutan
BV Bouvet Island
BW Botswana
BY Belarus
BZ Belize
CA Canada
CC Cocos (Keeling) Islands
CD Congo (Dem. Rep.)
CF Central African Rep.
CG Congo (Rep.)
CH Switzerland
CI Cote d'Ivoire
CK Cook Islands
CL Chile
CM Cameroon
CN China
CO Colombia
CR Costa Rica
CU Cuba
CV Cape Verde
CW Curacao
CX Christmas Island
CY Cyprus
CZ Czech Republic
DE Germany
DJ Djibouti
DK Denmark
DM Dominica
DO Dominican Republic
DZ Algeria

EC Ecuador
EE Estonia
EG Egypt
EH Western Sahara
ER Eritrea
ES Spain
ET Ethiopia
FI Finland
FJ Fiji
FK Falkland Islands
FM Micronesia
FO Faroe
Islands
FR France
GA Gabon
GB Britain (UK)
GD Grenada
GE Georgia
GF French Guiana
GG Guernsey
GH Ghana
GI Gibraltar
GL Greenland
GM Gambia
GN Guinea
GP Guadeloupe
GQ Equatorial Guinea
GR Greece
GS South Georgia & the South Sandwich Islands
GT Guatemala
GU Guam
GW Guinea-Bissau
GY Guyana
HK Hong Kong
HM Heard Island & McDonald Islands
HN Honduras
HR Croatia
HT Haiti
HU Hungary
ID Indonesia
IE Ireland
IL Israel
IM Isle of Man
IN India
IO British Indian Ocean Territory
IQ Iraq
IR Iran
IS Iceland

IT Italy
JE Jersey
JM Jamaica
JO Jordan
JP Japan
KE Kenya
KG Kyrgyzstan
KH Cambodia
KI Kiribati
KM Comoros
KN St Kitts & Nevis
KP Korea (North)
KR Korea (South)
KW Kuwait
KY Cayman Islands
KZ Kazakhstan
LA Laos
LB Lebanon
LC St Lucia
LI Liechtenstein
LK Sri Lanka
LR Liberia
LS Lesotho
LT Lithuania
LU Luxembourg
LV Latvia
LY Libya
MA Morocco
MC Monaco
MD Moldova
ME Montenegro
MF St Martin (French part)
MG Madagascar
MH Marshall Islands
MK Macedonia
ML Mali
MM Myanmar (Burma)
MN Mongolia
MO Macau
MP Northern
Mariana Islands
MQ Martinique
MR Mauritania
MS Montserrat
MT Malta
MU Mauritius
MV Maldives
MW Malawi

MX Mexico
MY Malaysia
MZ Mozambique
NA Namibia
NC New Caledonia
NE Niger
NF Norfolk Island
NG Nigeria
NI Nicaragua
NL Netherlands
NO Norway
NP Nepal
NR Nauru
NU Niue
NZ New Zealand
OM Oman
PA Panama
PE Peru
PF French Polynesia
PG Papua New Guinea
PH Philippines
PK Pakistan
PL Poland
PM St Pierre & Miquelon
PN Pitcairn
PR Puerto Rico
PS Palestine
PT Portugal
PW Palau
PY Paraguay
QA Qatar
RE Reunion
RO Romania
RS Serbia
RU Russia
RW Rwanda
SA Saudi Arabia
SB Solomon Islands
SC Seychelles
SD Sudan
SE Sweden
SG Singapore
SH St Helena
SI Slovenia
SJ Svalbard & Jan Mayen
SK Slovakia
SL Sierra Leone
SM San Marino

SN Senegal
SO Somalia
SR Suriname
SS South Sudan
ST Sao Tome & Principe
SV El Salvador
SX Sint Maarten
SY Syria
SZ Swaziland
TC Turks & Caicos Is
TD Chad
TF French Southern & Antarctic Lands
TG Togo
TH Thailand
TJ Tajikistan
TK Tokelau
TL East Timor
TM Turkmenistan
TN Tunisia
TO Tonga
TR Turkey
TT Trinidad
& Tobago
TV Tuvalu
TW Taiwan
TZ Tanzania
UA Ukraine
UG Uganda
UM US minor outlying islands
US United States
UY Uruguay
UZ Uzbekistan
VA Vatican City
VC St Vincent
VE Venezuela
VG Virgin Islands (UK)
VI Virgin Islands (US)
VN Vietnam
VU Vanuatu
WF Wallis & Futuna
WS Samoa (western)
YE Yemen
YT Mayotte
ZA South Africa
ZM Zambia
ZW Zimbabwe

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/iso3166.tab
```

No license file was found, but licenses were detected in source scan.

```
/*
```

```
* Copyright 2000 Sun Microsystems, Inc. All Rights Reserved.
```

```
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
```

```
*
```

```
* This code is free software; you can redistribute it and/or modify it
```

```
* under the terms of the GNU General Public License version 2 only, as
```

```
* published by the Free Software Foundation. Sun designates this
```

```
* particular file as subject to the "Classpath" exception as provided
```

```
* by Sun in the LICENSE file that accompanied this code.
```

```
*
```

```
* This code is distributed in the hope that it will be useful, but WITHOUT
```

```
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
```

```
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
```

```
* version 2 for more details (a copy is included in the LICENSE file that
```

```
* accompanied this code).
```

```
*
```

```
* You should have received a copy of the GNU General Public License version
```

```
* 2 along with this work; if not, write to the Free
```

```
Software Foundation,
```

```
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
```

```
*
```

```
* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
```

```
* CA 95054 USA or visit www.sun.com if you need additional information or
```

```
* have any questions.
```

```
*/
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/Checksum.java
```

No license file was found, but licenses were detected in source scan.

```
# <pre>
```

```
# This file is in the public domain, so clarified as of
```

```
# 2009-05-17 by Arthur David Olson.
```

```
# For companies who don't want to put time zone specification in
```

```
# their installation procedures. When users run date, they'll get the message.
```

```
# Also useful for the "comp.sources" version.
```

```
# Zone NAME GMTOFF RULES FORMAT
```

```
Zone Factory 0 - "Local time zone must be set--see zic manual page"
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
```

2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/factory

No license file was found, but licenses were detected in source scan.

This file is in the public domain, so clarified as of
2009-05-17 by Arthur David Olson.

----- Outline -----

Time and date functions
Scope of the tz database
Names of time zone rule files
Time zone abbreviations
Calendrical issues
Time and time zones on Mars

----- Time and date functions -----

These time and date functions are upwards compatible with POSIX,
an international standard for UNIX-like systems.

As of this writing, the current edition of POSIX is:

Standard for Information technology
-- Portable Operating System Interface (POSIX (R))
-- System Interfaces
IEEE Std 1003.1, 2004 Edition
<<http://www.opengroup.org/online-pubs?DOC=7999959899>>
<<http://www.opengroup.org/pubs/catalog/t041.htm>>

POSIX has the following properties and limitations.

* In POSIX, time display in a process is controlled by the
environment variable TZ. Unfortunately, the POSIX TZ string takes
a form that is hard to
describe and is error-prone in practice.

Also, POSIX TZ strings can't deal with other (for example, Israeli)
daylight saving time rules, or situations where more than two
time zone abbreviations are used in an area.

The POSIX TZ string takes the following form:

```
stdoffset[dst[offset],date[/time],date[/time]]
```

where:

std and dst
are 3 or more characters specifying the standard
and daylight saving time (DST) zone names.
Starting with POSIX.1-2001, std and dst may also be

in a quoted form like "<UTC+10>"; this allows "+" and "-" in the names.

offset

is of the form `[-]hh:[mm[:ss]]' and specifies the offset west of UTC. The default DST offset is one hour ahead of standard time.

date[/time],date[/time]

specifies the beginning and end of DST. If this is absent, the system supplies its own rules for DST, and these can differ from year to year; typically US DST rules are used.

time

takes the form `hh:[mm[:ss]]' and defaults to 02:00.

date

takes one of

the following forms:

Jn (1<=n<=365)

origin-1 day number not counting February 29

n (0<=n<=365)

origin-0 day number counting February 29 if present

Mm.n.d (0[Sunday]<=d<=6[Saturday], 1<=n<=5, 1<=m<=12)

for the dth day of week n of month m of the year,

where week 1 is the first week in which day d appears,

and `5' stands for the last week in which day d appears

(which may be either the 4th or 5th week).

Here is an example POSIX TZ string, for US Pacific time using rules appropriate from 1987 through 2006:

```
TZ='PST8PDT,M4.1.0/02:00,M10.5.0/02:00'
```

This POSIX TZ string is hard to remember, and mishandles time stamps before 1987 and after 2006. With this package you can use this instead:

```
TZ='America/Los_Angeles'
```

* POSIX does not define the exact meaning of TZ values like "EST5EDT". Typically the current US DST rules are used to interpret such values, but this means that the US DST rules are compiled into each program that does time conversion. This means that when US time conversion rules change (as in the United States in 1987), all programs that do time conversion must be recompiled to ensure proper results.

* In POSIX, there's no tamper-proof way for a process to learn the system's best idea of local wall clock. (This is important for applications that an administrator wants used only at certain times--without regard to whether the user has fiddled the "TZ" environment

variable. While an administrator can "do everything in UTC" to get around the problem, doing so is inconvenient and precludes handling daylight saving time shifts--as might be required to limit phone calls to off-peak hours.)

* POSIX requires that systems ignore leap seconds.

These are the extensions that have been made to the POSIX functions:

* The "TZ" environment variable is used in generating the name of a file from which time zone information is read (or is interpreted a la POSIX); "TZ" is no longer constrained to be a three-letter time zone name followed by a number of hours and an optional three-letter daylight time zone name. The daylight saving time rules to be used for a particular time zone are encoded in the time zone file; the format of the file allows U.S., Australian, and other rules to be encoded, and allows for situations where more than two time zone abbreviations are used.

It was recognized that allowing the "TZ" environment variable to take on values such as "America/New_York" might cause "old" programs (that expect "TZ" to have a certain form) to operate incorrectly; consideration was given to using some other environment variable (for example, "TIMEZONE") to hold the string used to generate the time zone information file name. In the end, however, it was decided to continue using "TZ": it is widely used for time zone purposes; separately maintaining both "TZ" and "TIMEZONE" seemed a nuisance; and systems where "new" forms of "TZ" might cause problems can simply use TZ values such as "EST5EDT" which can be used both by "new" programs (a la POSIX) and "old" programs (as zone names and offsets).

* To handle places where more than two time zone abbreviations are used, the functions "localtime" and "gmtime" set tzname[tmp->tm_isdst] (where "tmp" is the value the function returns) to the time zone abbreviation to be used. This differs from POSIX, where the elements of tzname are only changed as a result of calls to tzset.

* Since the "TZ" environment variable can now be used to control time conversion, the "daylight" and "timezone" variables are no longer needed. (These variables are defined and set by "tzset"; however, their values will not be used by "localtime.")

* The "localtime" function has been set up to deliver correct results for near-minimum or near-maximum time_t values. (A comment in the source code tells how to get compatibly wrong results).

* A function "tzsetwall" has been added to arrange for the system's best approximation to local wall clock time to be delivered by subsequent calls to "localtime." Source code for portable applications that "must" run on local wall clock time should call "tzsetwall();" if such code is moved to "old" systems that don't provide tzsetwall, you won't be able to generate an executable program. (These time zone functions also arrange for local wall clock time to be used if tzset is called--directly or indirectly--and there's no "TZ" environment variable; portable applications should not, however, rely on this behavior since it's not the way SVR2 systems behave.)

* These functions can account for leap seconds, thanks to Bradley White.

Points of interest to folks with other systems:

* This package is already part of many POSIX-compliant hosts, including BSD, HP, Linux, Network Appliance, SCO, SGI, and Sun. On such hosts, the primary use of this package is to update obsolete time zone rule tables. To do this, you may need to compile the time zone compiler `zic' supplied with this package instead of using the system `zic', since the format of zic's input changed slightly in late 1994, and many vendors still do not support the new input format.

* The UNIX Version 7 "timezone" function is not present in this package; it's impossible to reliably map timezone's arguments (a "minutes west of GMT" value and a "daylight saving time in effect" flag) to a time zone abbreviation, and we refuse to guess. Programs that in the past used the timezone function may now examine tzname[localtime(&clock)->tm_isdst] to learn the correct time zone abbreviation to use. Alternatively, use localtime(&clock)->tm_zone if this has been enabled.

* The 4.2BSD gettimeofday function is not used in this package. This formerly let users obtain the current UTC offset and DST flag, but this functionality was removed in later versions of BSD.

* In SVR2, time conversion fails for near-minimum or near-maximum time_t values when doing conversions for places that don't use UTC. This package takes care to do these conversions correctly.

The functions that are conditionally compiled if STD_INSPIRED is defined should, at this point, be looked on primarily as food for thought. They are not in any sense "standard compatible"--some are not, in fact, specified in

any standard. They do, however, represent responses of various authors to standardization proposals.

Other time conversion proposals, in particular the one developed by folks at Hewlett Packard, offer a wider selection of functions that provide capabilities beyond those provided here. The absence of such functions from this package is not meant to discourage the development, standardization, or use of such functions. Rather, their absence reflects the decision to make this package contain valid extensions to POSIX, to ensure its broad acceptability. If more powerful time conversion functions can be standardized, so much the better.

----- Scope of the tz database -----

The tz database attempts to record the history and predicted future of all computer-based clocks that track civil time. To represent this data, the world is partitioned into regions whose clocks all agree about time stamps that occur after the somewhat-arbitrary cutoff point of the POSIX Epoch (1970-01-01 00:00:00 UTC). For each such region, the database records all known clock transitions, and labels the region with a notable location.

Clock transitions before 1970 are recorded for each such location, because most POSIX-compatible systems support negative time stamps and could misbehave if data were omitted for pre-1970 transitions. However, the database is not designed for and does not suffice for applications requiring accurate handling of all past times everywhere, as it would take far too much effort and guesswork to record all details of pre-1970 civil timekeeping.

As noted in the README file, the tz database is not authoritative (particularly not for pre-1970 time stamps), and it surely has errors.

Corrections

are welcome and encouraged. Users requiring authoritative data should consult national standards bodies and the references cited in the database's comments.

----- Names of time zone rule files -----

The time zone rule file naming conventions attempt to strike a balance among the following goals:

- * Uniquely identify every national region where clocks have all agreed since 1970. This is essential for the intended use: static clocks keeping local civil time.

- * Indicate to humans as to where that region is. This simplifies use.
- * Be robust in the presence of political changes. This reduces the number of updates and backward-compatibility hacks. For example, names of countries are ordinarily not used, to avoid incompatibilities when countries change their name (e.g. Zaire->Congo) or when locations change countries (e.g. Hong Kong from UK colony to China).
- * Be portable to a wide variety of implementations. This promotes use of the technology.
- * Use a consistent naming convention over the entire world. This simplifies both use and maintenance.

This naming convention is not intended for use by inexperienced users to select TZ values by themselves (though they can of course examine and reuse existing settings). Distributors should provide documentation and/or a simple selection interface that explains the names; see the 'tzselect' program supplied with this distribution for one example.

Names normally have the form AREA/LOCATION, where AREA is the name of a continent or ocean, and LOCATION is the name of a specific location within that region. North and South America share the same area, 'America'. Typical names are 'Africa/Cairo', 'America/New_York', and 'Pacific/Honolulu'.

Here are the general rules used for choosing location names, in decreasing order of importance:

Use only valid POSIX file name components (i.e., the parts of names other than '/'). Within a file name component, use only ASCII letters, '.', '-', and '_'. Do not use digits, as that might create an ambiguity with POSIX TZ strings. A file name component must not exceed 14 characters or start with '-'. E.g., prefer 'Brunei' to 'Bandar_Seri_Begawan'.

Include at least one location per time zone rule set per country.

One such location is enough. Use ISO 3166 (see the file iso3166.tab) to help decide whether something is a country. However, uninhabited ISO 3166 regions like Bouvet Island do not need locations, since local time is not defined there.

If all the clocks in a country's region have agreed since 1970, don't bother to include more than one location even if subregions' clocks disagreed before 1970.

Otherwise these tables would become annoyingly large.
If a name is ambiguous, use a less ambiguous alternative;
e.g. many cities are named San Jose and Georgetown, so
prefer `Costa_Rica` to `San_Jose` and `Guyana` to `Georgetown`.
Keep locations compact. Use cities or small islands, not countries
or
regions, so that any future time zone changes do not split
locations into different time zones. E.g. prefer `Paris`
to `France`, since France has had multiple time zones.
Use mainstream English spelling, e.g. prefer `Rome` to `Roma`, and
prefer `Athens` to the true name (which uses Greek letters).
The POSIX file name restrictions encourage this rule.
Use the most populous among locations in a country's time zone,
e.g. prefer `Shanghai` to `Beijing`. Among locations with
similar populations, pick the best-known location,
e.g. prefer `Rome` to `Milan`.
Use the singular form, e.g. prefer `Canary` to `Canaries`.
Omit common suffixes like `_Islands` and `_City`, unless that
would lead to ambiguity. E.g. prefer `Cayman` to
`Cayman_Islands` and `Guatemala` to `Guatemala_City`,
but prefer `Mexico_City` to `Mexico` because the country
of Mexico has several time zones.
Use `_` to represent a space.
Omit `.` from abbreviations in names, e.g. prefer `St_Helena`
to
`St._Helena`.
Do not change established names if they only marginally
violate the above rules. For example, don't change
the existing name `Rome` to `Milan` merely because
Milan's population has grown to be somewhat greater
than Rome's.
If a name is changed, put its old spelling in the `backward` file.

The file `zone.tab` lists the geographical locations used to name
time zone rule files. It is intended to be an exhaustive list
of canonical names for geographic regions.

Older versions of this package used a different naming scheme,
and these older names are still supported.

See the file `backward` for most of these older names
(e.g. `US/Eastern` instead of `America/New_York`).

The other old-fashioned names still supported are
`WET`, `CET`, `MET`, and `EET` (see the file `europe`).

----- Time zone abbreviations -----

When this package is installed, it generates time zone abbreviations

like `EST` to be compatible with human tradition and POSIX.
Here are the general
rules used for choosing time zone abbreviations,
in decreasing order of importance:

Use abbreviations that consist of three or more ASCII letters.
Previous editions of this database also used characters like
' ' and '?', but these characters have a special meaning to
the shell and cause commands like
set `date`
to have unexpected effects.
Previous editions of this rule required upper-case letters,
but the Congressman who introduced Chamorro Standard Time
preferred "ChST", so the rule has been relaxed.

This rule guarantees that all abbreviations could have
been specified by a POSIX TZ string. POSIX
requires at least three characters for an
abbreviation. POSIX through 2000 says that an abbreviation
cannot start with ':', and cannot contain ',', '-',
'+', NUL, or a digit. POSIX from 2001 on changes this
rule to say that an abbreviation can contain only '-', '+',
and alphanumeric characters from the portable character set
in the current locale.
To be portable to both sets of
rules, an abbreviation must therefore use only ASCII
letters.

Use abbreviations that are in common use among English-speakers,
e.g. `EST` for Eastern Standard Time in North America.
We assume that applications translate them to other languages
as part of the normal localization process; for example,
a French application might translate `EST` to `HNE`.

For zones whose times are taken from a city's longitude, use the
traditional xMT notation, e.g. `PMT` for Paris Mean Time.
The only name like this in current use is `GMT`.

If there is no common English abbreviation, abbreviate the English
translation of the usual phrase used by native speakers.
If this is not available or is a phrase mentioning the country
(e.g. ``Cape Verde Time"), then:

When a country has a single or principal time zone region,
append `T` to the country's ISO code, e.g. `CVT` for
Cape Verde Time. For summer time append `ST`;
for double summer time

append `DST'; etc.

When a country has multiple time zones, take the first three letters of an English place name identifying each zone and then append `T', `ST', etc. as before; e.g. `VLAST' for VLAdivostok Summer Time.

Use UTC (with time zone abbreviation "zzz") for locations while uninhabited. The "zzz" mnemonic is that these locations are, in some sense, asleep.

Application writers should note that these abbreviations are ambiguous in practice: e.g. `EST' has a different meaning in Australia than it does in the United States. In new applications, it's often better to use numeric UTC offsets like `-0500' instead of time zone abbreviations like `EST'; this avoids the ambiguity.

----- Calendrical issues -----

Calendrical issues are a bit out of scope for a time zone database, but they indicate the sort of problems that we would run into if we extended the time zone database further into the past. An excellent resource in this area is Nachum Dershowitz and Edward M. Reingold, <http://emr.cs.iit.edu/home/reingold/calendar-book/third-edition/> Calendrical Calculations: Third Edition [http://emr.cs.iit.edu/home/reingold/calendar-book/third-edition/](#), Cambridge University Press (2008). Other information and sources are given below. They sometimes disagree.

France

Gregorian calendar adopted 1582-12-20.
French Revolutionary calendar used 1793-11-24 through 1805-12-31, and (in Paris only) 1871-05-06 through 1871-05-23.

Russia

From Chris Carrier (1996-12-02):
On 1929-10-01 the Soviet Union instituted an ``Eternal Calendar" with 30-day months plus 5 holidays, with a 5-day week.
On 1931-12-01 it changed to a 6-day week; in 1934 it reverted to the Gregorian calendar while retaining the 6-day week; on 1940-06-27 it reverted to the 7-day week. With the 6-day week the usual days off were the 6th, 12th, 18th, 24th and 30th of the month.
(Source: Evitiar Zerubavel, *The Seven Day Circle*)

Mark Brader reported a similar story in "The Book of Calendars", edited by Frank Parise (1982, Facts on File, ISBN 0-8719-6467-8), page 377. But:

From: Petteri Sulonen (via Usenet)

Date: 14 Jan 1999 00:00:00 GMT

...

If your source is correct, how come documents between 1929 -- 1940 were still dated using the conventional, Gregorian calendar?

I can post a scan of a document dated December 1, 1934, signed by Yenukidze, the secretary, on behalf of Kalinin, the President of the Executive Committee of the Supreme Soviet, if you like.

Sweden (and Finland)

From: Mark Brader

<news:1996Jul6.012937.29190@sq.com>

Subject: Re: Gregorian reform -- a part of locale?

Date: 1996-07-06

In 1700, Denmark made the transition from Julian to Gregorian. Sweden decided to *start* a transition in 1700 as well, but rather than have one of those unsightly calendar gaps :-), they simply decreed that the next leap year after 1696 would be in 1744 -- putting the whole country on a calendar different from both Julian and Gregorian for a period of 40 years.

However, in 1704 something went wrong and the plan was not carried through; they did, after all, have a leap year that year. And one in 1708. In 1712 they gave it up and went back to Julian, putting 30 days in February that year!...

Then in 1753, Sweden made the transition to Gregorian in the usual manner, getting there only 13 years behind the original schedule.

(A previous posting of this story was challenged, and Swedish readers produced the following references to support it: "Tiderakning och historia" by Natanael Beckman (1924) and "Tid, en bok om tiderakning och kalendervasen" by Lars-Olof Lode'n (no date was given).)

Grotefend's data

From: "Michael Palmer" [with one obvious typo fixed]
Subject: Re: Gregorian Calendar (was Re: Another FHC related question
Newsgroups: soc.genealogy.german
Date: Tue, 9 Feb 1999 02:32:48 -800
...

The following is a(n incomplete) listing, arranged chronologically, of European states, with the date they converted from the Julian to the Gregorian calendar:

04/15 Oct 1582 - Italy (with exceptions), Spain, Portugal, Poland (Roman Catholics and Danzig only)
09/20 Dec 1582 - France, Lorraine

21 Dec 1582/
01 Jan 1583 - Holland, Brabant, Flanders, Hennegau
10/21 Feb 1583 - bishopric of Liege (L"uttich)
13/24 Feb 1583 - bishopric of Augsburg
04/15 Oct 1583 - electorate of Trier
05/16 Oct 1583 - Bavaria, bishoprics of Freising, Eichstedt, Regensburg, Salzburg, Brixen
13/24 Oct 1583 - Austrian Oberelsass and Breisgau
20/31 Oct 1583 - bishopric of Basel
02/13 Nov 1583 - duchy of J"ulich-Berg
02/13 Nov 1583 - electorate and city of K"oln
04/15 Nov 1583 - bishopric of W"urzburg
11/22 Nov 1583 - electorate of Mainz
16/27 Nov 1583 - bishopric of Strassburg and the margraviate of Baden
17/28 Nov 1583 - bishopric of M"unster and duchy of Cleve
14/25 Dec 1583 - Steiermark

06/17 Jan 1584 - Austria and Bohemia
11/22 Jan 1584 - Luzern, Uri, Schwyz, Zug, Freiburg, Solothurn
12/23 Jan 1584 - Silesia and the Lausitz
22 Jan/
02 Feb 1584 - Hungary
(legally on 21 Oct 1587)
Jun 1584 - Unterwalden
01/12 Jul 1584 - duchy of Westfalen

16/27 Jun 1585 - bishopric of Paderborn

14/25 Dec 1590 - Transylvania

22 Aug/
02 Sep 1612 - duchy of Prussia

13/24 Dec 1614 - Pfalz-Neuburg

1617 - duchy of Kurland (reverted to the Julian calendar in 1796)

1624 - bishopric of Osnabr"uck

1630 - bishopric of Minden

15/26 Mar 1631 - bishopric of Hildesheim

1655 - Kanton Wallis

05/16 Feb 1682 - city of Strassburg

18 Feb/

01 Mar 1700 - Protestant Germany (including Swedish possessions in Germany), Denmark, Norway

30 Jun/

12 Jul 1700 - Gelderland, Zutphen

10 Nov/

12 Dec 1700 - Utrecht, Overijssel

31 Dec 1700/

12 Jan 1701 - Friesland, Groningen, Z"urich, Bern, Basel, Geneva, Turgau, and Schaffhausen

1724 - Glarus, Appenzell, and the city of St. Gallen

01 Jan 1750 - Pisa and Florence

02/14 Sep 1752 - Great Britain

17 Feb/

01 Mar 1753 - Sweden

1760-1812 - Graub"unden

The Russian empire (including Finland and the Baltic states) did not convert to the Gregorian calendar until the Soviet revolution of 1917.

Source: H. Grotefend, *Taschenbuch der Zeitrechnung des deutschen Mittelalters und der Neuzeit*, herausgegeben von Dr. O. Grotefend (Hannover: Hahnsche Buchhandlung, 1941), pp. 26-28.

----- Time and time zones on Mars -----

Some people have adjusted their work schedules to fit Mars time. Dozens of special Mars watches were built for Jet Propulsion Laboratory workers who kept Mars time during the Mars Exploration Rovers mission (2004). These timepieces look like normal Seikos and Citizens but use Mars seconds rather than terrestrial seconds.

A Mars solar day is called a "sol" and has a mean period equal to about 24 hours 39 minutes 35.244 seconds in terrestrial time. It is divided into a conventional 24-hour clock, so each Mars second equals about 1.02749125 terrestrial seconds.

The prime meridian of Mars goes through the center of the crater Airy-0, named in honor of the British astronomer who built the Greenwich telescope that defines Earth's prime meridian. Mean solar time on the Mars prime meridian is called Mars Coordinated Time (MTC).

Each landed mission on Mars has adopted a different reference for solar time keeping, so there is no real standard for Mars time zones. For example, the Mars Exploration Rover project (2004) defined two time zones "Local Solar Time A" and "Local Solar Time B" for its two missions, each zone designed so that its time equals local true solar time at approximately the middle of the nominal mission. Such a "time zone" is not particularly suited for any application other than the mission itself.

Many calendars have been proposed for Mars, but none have achieved wide acceptance. Astronomers often use Mars Sol Date (MSD) which is a sequential count of Mars solar days elapsed since about 1873-12-29 12:00 GMT.

The tz database does not currently support Mars time, but it is documented here in the hopes that support will be added eventually.

Sources:

Michael Allison and Robert Schmunk,
"Technical Notes on Mars Solar Time as Adopted by the Mars24 Sunclock"
<<http://www.giss.nasa.gov/tools/mars24/help/notes.html>> (2004-07-30).

Jia-Rui Chong, "Workdays Fit for a Martian", Los Angeles Times
(2004-01-14), pp A1, A20-A21.

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/Theory

No license file was found, but licenses were detected in source scan.

```
#
# Copyright 2000-2006 Sun Microsystems, Inc. All Rights Reserved.
# DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
#
# This code is free software; you can redistribute it and/or modify it
# under the terms of the GNU General Public License version 2 only, as
# published by the Free Software Foundation. Sun designates this
# particular file as subject to the "Classpath" exception as provided
# by Sun in the LICENSE file that accompanied this code.
#
# This code is distributed in the hope that it will be useful, but WITHOUT
# ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
# FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
# version 2 for more details (a copy is included in the LICENSE file that
# accompanied this code).
#
# You should have received a copy of the GNU General Public License version
# 2 along with this work; if not, write to the Free Software
# Foundation,
# Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
#
# Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
# CA 95054 USA or visit www.sun.com if you need additional information or
# have any questions.
#
# JDK 1.1.x compatible time zone IDs
#
```

```
Link Australia/Darwin ACT
Link Australia/Sydney AET
Link America/Argentina/Buenos_Aires AGT
Link Africa/Cairo ART
Link America/Anchorage AST
Link America/Sao_Paulo BET
Link Asia/Dhaka BST
Link Africa/Harare CAT
Link America/St_Johns CNT
Link America/Chicago CST
Link Asia/Shanghai CTT
Link Africa/Addis_Ababa EAT
Link Europe/Paris ECT
Link America/New_York EST
Link Pacific/Honolulu HST
Link America/Indianapolis IET
Link Asia/Calcutta IST
Link Asia/Tokyo JST
```

Link Pacific/Apia MIT
Link America/Denver MST
Link Asia/Yerevan NET
Link Pacific/Auckland NST
Link Asia/Karachi PLT
Link America/Phoenix PNT
Link America/Puerto_Rico PRT
Link America/Los_Angeles PST
Link Pacific/Guadalcanal SST
Link Asia/Saigon VST

#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule SystemV min 1973 - Apr lastSun 2:00 1:00 D
Rule SystemV min 1973 - Oct lastSun 2:00 0 S
Rule SystemV 1974 only - Jan 6 2:00 1:00 D
Rule SystemV 1974 only - Nov lastSun 2:00 0 S
Rule SystemV 1975 only - Feb 23 2:00 1:00 D
Rule SystemV 1975 only - Oct lastSun 2:00 0 S
Rule SystemV 1976 max - Apr lastSun 2:00 1:00 D
Rule SystemV 1976 max - Oct lastSun 2:00 0 S

Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]

Zone SystemV/AST4ADT -4:00 SystemV A%sT
Zone SystemV/EST5EDT -5:00 SystemV E%sT
Zone SystemV/CST6CDT -6:00 SystemV C%sT
Zone SystemV/MST7MDT -7:00 SystemV M%sT
Zone SystemV/PST8PDT -8:00 SystemV P%sT
Zone SystemV/YST9YDT -9:00 SystemV Y%sT
Zone SystemV/AST4 -4:00 - AST
Zone SystemV/EST5 -5:00 - EST
Zone SystemV/CST6 -6:00 - CST
Zone SystemV/MST7 -7:00 - MST
Zone SystemV/PST8 -8:00 - PST
Zone SystemV/YST9 -9:00 - YST
Zone SystemV/HST10 -10:00 - HST

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/tzdata_jdk/jdk11_backward

No license file was found, but licenses were detected in source scan.

<pre>

This file is in the public domain, so clarified as of
2009-05-17 by Arthur David Olson.

From Arthur David Olson (1989-04-05):

On 1989-04-05, the U. S. House of Representatives passed (238-154) a bill

```
# establishing "Pacific Presidential Election Time"; it was not acted on
# by the Senate or signed into law by the President.
# You might want to change the "PE" (Presidential Election) below to
# "Q" (Quadrennial) to maintain three-character zone abbreviations.
# If you're really conservative, you might want to change it to "D".
# Avoid "L" (Leap Year), which won't be true in 2100.

# If Presidential Election Time is ever established, replace "XXXX" below
# with the year the law takes effect and uncomment the "###" lines.
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
### Rule Twilite XXXX max - Apr Sun>=1 2:00 1:00 D
### Rule Twilite XXXX max uspres Oct lastSun 2:00 1:00 PE
### Rule Twilite XXXX max uspres Nov Sun>=7 2:00 0 S
###
Rule Twilite XXXX max nonpres Oct lastSun 2:00 0 S
```

```
# Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]
### Zone America/Los_Angeles-PET -8:00 US P%sT XXXX
### -8:00 Twilite P%sT
```

```
# For now...
Link America/Los_Angeles US/Pacific-New ##
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/pacificnew
No license file was found, but licenses were detected in source scan.
```

```
# <pre>
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.
```

```
# So much for footnotes about Saudi Arabia.
# Apparent noon times below are for Riyadh; your mileage will vary.
# Times were computed using formulas in the U.S. Naval Observatory's
# Almanac for Computers 1987; the formulas "will give EqT to an accuracy of
# [plus or minus two] seconds during the current year."
#
# Rounding to the nearest five seconds results in fewer than
# 256 different "time types"--a limit that's faced because time types are
# stored on disk as unsigned chars.
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule sol87 1987 only - Jan 1 12:03:20s -0:03:20 -
Rule sol87 1987 only - Jan 2 12:03:50s -0:03:50 -
Rule sol87 1987 only - Jan 3 12:04:15s -0:04:15 -
Rule sol87 1987 only - Jan 4 12:04:45s -0:04:45 -
```

Rule sol87 1987 only - Jan 5 12:05:10s -0:05:10 -
Rule sol87 1987 only - Jan 6 12:05:40s -0:05:40
-
Rule sol87 1987 only - Jan 7 12:06:05s -0:06:05 -
Rule sol87 1987 only - Jan 8 12:06:30s -0:06:30 -
Rule sol87 1987 only - Jan 9 12:06:55s -0:06:55 -
Rule sol87 1987 only - Jan 10 12:07:20s -0:07:20 -
Rule sol87 1987 only - Jan 11 12:07:45s -0:07:45 -
Rule sol87 1987 only - Jan 12 12:08:10s -0:08:10 -
Rule sol87 1987 only - Jan 13 12:08:30s -0:08:30 -
Rule sol87 1987 only - Jan 14 12:08:55s -0:08:55 -
Rule sol87 1987 only - Jan 15 12:09:15s -0:09:15 -
Rule sol87 1987 only - Jan 16 12:09:35s -0:09:35 -
Rule sol87 1987 only - Jan 17 12:09:55s -0:09:55 -
Rule sol87 1987 only - Jan 18 12:10:15s -0:10:15 -
Rule sol87 1987 only - Jan 19 12:10:35s -0:10:35 -
Rule sol87 1987 only - Jan 20 12:10:55s -0:10:55 -
Rule sol87 1987 only - Jan 21 12:11:10s -0:11:10 -
Rule sol87 1987 only - Jan 22 12:11:30s -0:11:30 -
Rule sol87 1987 only - Jan 23 12:11:45s -0:11:45 -
Rule sol87 1987 only - Jan 24 12:12:00s -0:12:00 -
Rule sol87 1987 only - Jan 25 12:12:15s -0:12:15 -
Rule sol87 1987 only - Jan 26 12:12:30s
-0:12:30 -
Rule sol87 1987 only - Jan 27 12:12:40s -0:12:40 -
Rule sol87 1987 only - Jan 28 12:12:55s -0:12:55 -
Rule sol87 1987 only - Jan 29 12:13:05s -0:13:05 -
Rule sol87 1987 only - Jan 30 12:13:15s -0:13:15 -
Rule sol87 1987 only - Jan 31 12:13:25s -0:13:25 -
Rule sol87 1987 only - Feb 1 12:13:35s -0:13:35 -
Rule sol87 1987 only - Feb 2 12:13:40s -0:13:40 -
Rule sol87 1987 only - Feb 3 12:13:50s -0:13:50 -
Rule sol87 1987 only - Feb 4 12:13:55s -0:13:55 -
Rule sol87 1987 only - Feb 5 12:14:00s -0:14:00 -
Rule sol87 1987 only - Feb 6 12:14:05s -0:14:05 -
Rule sol87 1987 only - Feb 7 12:14:10s -0:14:10 -
Rule sol87 1987 only - Feb 8 12:14:10s -0:14:10 -
Rule sol87 1987 only - Feb 9 12:14:15s -0:14:15 -
Rule sol87 1987 only - Feb 10 12:14:15s -0:14:15 -
Rule sol87 1987 only - Feb 11 12:14:15s -0:14:15 -
Rule sol87 1987 only - Feb 12 12:14:15s -0:14:15 -
Rule sol87 1987 only - Feb 13 12:14:15s -0:14:15 -
Rule sol87 1987 only - Feb 14 12:14:15s -0:14:15 -
Rule sol87 1987 only - Feb 15 12:14:10s
-0:14:10 -
Rule sol87 1987 only - Feb 16 12:14:10s -0:14:10 -
Rule sol87 1987 only - Feb 17 12:14:05s -0:14:05 -
Rule sol87 1987 only - Feb 18 12:14:00s -0:14:00 -

Rule sol87 1987 only - Feb 19 12:13:55s -0:13:55 -
Rule sol87 1987 only - Feb 20 12:13:50s -0:13:50 -
Rule sol87 1987 only - Feb 21 12:13:45s -0:13:45 -
Rule sol87 1987 only - Feb 22 12:13:35s -0:13:35 -
Rule sol87 1987 only - Feb 23 12:13:30s -0:13:30 -
Rule sol87 1987 only - Feb 24 12:13:20s -0:13:20 -
Rule sol87 1987 only - Feb 25 12:13:10s -0:13:10 -
Rule sol87 1987 only - Feb 26 12:13:00s -0:13:00 -
Rule sol87 1987 only - Feb 27 12:12:50s -0:12:50 -
Rule sol87 1987 only - Feb 28 12:12:40s -0:12:40 -
Rule sol87 1987 only - Mar 1 12:12:30s -0:12:30 -
Rule sol87 1987 only - Mar 2 12:12:20s -0:12:20 -
Rule sol87 1987 only - Mar 3 12:12:05s -0:12:05 -
Rule sol87 1987 only - Mar 4 12:11:55s -0:11:55 -
Rule sol87 1987 only - Mar 5 12:11:40s -0:11:40 -
Rule sol87 1987 only - Mar 6 12:11:25s -0:11:25 -
Rule sol87 1987 only - Mar 7 12:11:15s
-0:11:15 -
Rule sol87 1987 only - Mar 8 12:11:00s -0:11:00 -
Rule sol87 1987 only - Mar 9 12:10:45s -0:10:45 -
Rule sol87 1987 only - Mar 10 12:10:30s -0:10:30 -
Rule sol87 1987 only - Mar 11 12:10:15s -0:10:15 -
Rule sol87 1987 only - Mar 12 12:09:55s -0:09:55 -
Rule sol87 1987 only - Mar 13 12:09:40s -0:09:40 -
Rule sol87 1987 only - Mar 14 12:09:25s -0:09:25 -
Rule sol87 1987 only - Mar 15 12:09:10s -0:09:10 -
Rule sol87 1987 only - Mar 16 12:08:50s -0:08:50 -
Rule sol87 1987 only - Mar 17 12:08:35s -0:08:35 -
Rule sol87 1987 only - Mar 18 12:08:15s -0:08:15 -
Rule sol87 1987 only - Mar 19 12:08:00s -0:08:00 -
Rule sol87 1987 only - Mar 20 12:07:40s -0:07:40 -
Rule sol87 1987 only - Mar 21 12:07:25s -0:07:25 -
Rule sol87 1987 only - Mar 22 12:07:05s -0:07:05 -
Rule sol87 1987 only - Mar 23 12:06:50s -0:06:50 -
Rule sol87 1987 only - Mar 24 12:06:30s -0:06:30 -
Rule sol87 1987 only - Mar 25 12:06:10s -0:06:10 -
Rule sol87 1987 only - Mar 26 12:05:55s
-0:05:55 -
Rule sol87 1987 only - Mar 27 12:05:35s -0:05:35 -
Rule sol87 1987 only - Mar 28 12:05:15s -0:05:15 -
Rule sol87 1987 only - Mar 29 12:05:00s -0:05:00 -
Rule sol87 1987 only - Mar 30 12:04:40s -0:04:40 -
Rule sol87 1987 only - Mar 31 12:04:25s -0:04:25 -
Rule sol87 1987 only - Apr 1 12:04:05s -0:04:05 -
Rule sol87 1987 only - Apr 2 12:03:45s -0:03:45 -
Rule sol87 1987 only - Apr 3 12:03:30s -0:03:30 -
Rule sol87 1987 only - Apr 4 12:03:10s -0:03:10 -
Rule sol87 1987 only - Apr 5 12:02:55s -0:02:55 -

Rule sol87 1987 only - Apr 6 12:02:35s -0:02:35 -
Rule sol87 1987 only - Apr 7 12:02:20s -0:02:20 -
Rule sol87 1987 only - Apr 8 12:02:05s -0:02:05 -
Rule sol87 1987 only - Apr 9 12:01:45s -0:01:45 -
Rule sol87 1987 only - Apr 10 12:01:30s -0:01:30 -
Rule sol87 1987 only - Apr 11 12:01:15s -0:01:15 -
Rule sol87 1987 only - Apr 12 12:00:55s -0:00:55 -
Rule sol87 1987 only - Apr 13 12:00:40s -0:00:40 -
Rule sol87 1987 only - Apr 14 12:00:25s -0:00:25 -
Rule sol87 1987 only - Apr 15 12:00:10s
-0:00:10 -
Rule sol87 1987 only - Apr 16 11:59:55s 0:00:05 -
Rule sol87 1987 only - Apr 17 11:59:45s 0:00:15 -
Rule sol87 1987 only - Apr 18 11:59:30s 0:00:30 -
Rule sol87 1987 only - Apr 19 11:59:15s 0:00:45 -
Rule sol87 1987 only - Apr 20 11:59:05s 0:00:55 -
Rule sol87 1987 only - Apr 21 11:58:50s 0:01:10 -
Rule sol87 1987 only - Apr 22 11:58:40s 0:01:20 -
Rule sol87 1987 only - Apr 23 11:58:25s 0:01:35 -
Rule sol87 1987 only - Apr 24 11:58:15s 0:01:45 -
Rule sol87 1987 only - Apr 25 11:58:05s 0:01:55 -
Rule sol87 1987 only - Apr 26 11:57:55s 0:02:05 -
Rule sol87 1987 only - Apr 27 11:57:45s 0:02:15 -
Rule sol87 1987 only - Apr 28 11:57:35s 0:02:25 -
Rule sol87 1987 only - Apr 29 11:57:25s 0:02:35 -
Rule sol87 1987 only - Apr 30 11:57:15s 0:02:45 -
Rule sol87 1987 only - May 1 11:57:10s 0:02:50 -
Rule sol87 1987 only - May 2 11:57:00s 0:03:00 -
Rule sol87 1987 only - May 3 11:56:55s 0:03:05 -
Rule sol87 1987 only - May 4 11:56:50s 0:03:10 -
Rule sol87 1987 only - May 5 11:56:45s
0:03:15 -
Rule sol87 1987 only - May 6 11:56:40s 0:03:20 -
Rule sol87 1987 only - May 7 11:56:35s 0:03:25 -
Rule sol87 1987 only - May 8 11:56:30s 0:03:30 -
Rule sol87 1987 only - May 9 11:56:25s 0:03:35 -
Rule sol87 1987 only - May 10 11:56:25s 0:03:35 -
Rule sol87 1987 only - May 11 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 12 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 13 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 14 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 15 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 16 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 17 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 18 11:56:20s 0:03:40 -
Rule sol87 1987 only - May 19 11:56:25s 0:03:35 -
Rule sol87 1987 only - May 20 11:56:25s 0:03:35 -
Rule sol87 1987 only - May 21 11:56:30s 0:03:30 -

Rule sol87 1987 only - May 22 11:56:35s 0:03:25 -
Rule sol87 1987 only - May 23 11:56:40s 0:03:20 -
Rule sol87 1987 only - May 24 11:56:45s 0:03:15 -
Rule sol87 1987 only - May 25 11:56:50s
0:03:10 -
Rule sol87 1987 only - May 26 11:56:55s 0:03:05 -
Rule sol87 1987 only - May 27 11:57:00s 0:03:00 -
Rule sol87 1987 only - May 28 11:57:10s 0:02:50 -
Rule sol87 1987 only - May 29 11:57:15s 0:02:45 -
Rule sol87 1987 only - May 30 11:57:25s 0:02:35 -
Rule sol87 1987 only - May 31 11:57:30s 0:02:30 -
Rule sol87 1987 only - Jun 1 11:57:40s 0:02:20 -
Rule sol87 1987 only - Jun 2 11:57:50s 0:02:10 -
Rule sol87 1987 only - Jun 3 11:58:00s 0:02:00 -
Rule sol87 1987 only - Jun 4 11:58:10s 0:01:50 -
Rule sol87 1987 only - Jun 5 11:58:20s 0:01:40 -
Rule sol87 1987 only - Jun 6 11:58:30s 0:01:30 -
Rule sol87 1987 only - Jun 7 11:58:40s 0:01:20 -
Rule sol87 1987 only - Jun 8 11:58:50s 0:01:10 -
Rule sol87 1987 only - Jun 9 11:59:05s 0:00:55 -
Rule sol87 1987 only - Jun 10 11:59:15s 0:00:45 -
Rule sol87 1987 only - Jun 11 11:59:30s 0:00:30 -
Rule sol87 1987 only - Jun 12 11:59:40s 0:00:20 -
Rule sol87 1987 only - Jun 13 11:59:50s 0:00:10 -
Rule sol87 1987 only - Jun 14 12:00:05s -0:00:05
-
Rule sol87 1987 only - Jun 15 12:00:15s -0:00:15 -
Rule sol87 1987 only - Jun 16 12:00:30s -0:00:30 -
Rule sol87 1987 only - Jun 17 12:00:45s -0:00:45 -
Rule sol87 1987 only - Jun 18 12:00:55s -0:00:55 -
Rule sol87 1987 only - Jun 19 12:01:10s -0:01:10 -
Rule sol87 1987 only - Jun 20 12:01:20s -0:01:20 -
Rule sol87 1987 only - Jun 21 12:01:35s -0:01:35 -
Rule sol87 1987 only - Jun 22 12:01:50s -0:01:50 -
Rule sol87 1987 only - Jun 23 12:02:00s -0:02:00 -
Rule sol87 1987 only - Jun 24 12:02:15s -0:02:15 -
Rule sol87 1987 only - Jun 25 12:02:25s -0:02:25 -
Rule sol87 1987 only - Jun 26 12:02:40s -0:02:40 -
Rule sol87 1987 only - Jun 27 12:02:50s -0:02:50 -
Rule sol87 1987 only - Jun 28 12:03:05s -0:03:05 -
Rule sol87 1987 only - Jun 29 12:03:15s -0:03:15 -
Rule sol87 1987 only - Jun 30 12:03:30s -0:03:30 -
Rule sol87 1987 only - Jul 1 12:03:40s -0:03:40 -
Rule sol87 1987 only - Jul 2 12:03:50s -0:03:50 -
Rule sol87 1987 only - Jul 3 12:04:05s -0:04:05 -
Rule sol87 1987 only - Jul 4 12:04:15s
-0:04:15 -
Rule sol87 1987 only - Jul 5 12:04:25s -0:04:25 -

Rule sol87 1987 only - Jul 6 12:04:35s -0:04:35 -
Rule sol87 1987 only - Jul 7 12:04:45s -0:04:45 -
Rule sol87 1987 only - Jul 8 12:04:55s -0:04:55 -
Rule sol87 1987 only - Jul 9 12:05:05s -0:05:05 -
Rule sol87 1987 only - Jul 10 12:05:15s -0:05:15 -
Rule sol87 1987 only - Jul 11 12:05:20s -0:05:20 -
Rule sol87 1987 only - Jul 12 12:05:30s -0:05:30 -
Rule sol87 1987 only - Jul 13 12:05:40s -0:05:40 -
Rule sol87 1987 only - Jul 14 12:05:45s -0:05:45 -
Rule sol87 1987 only - Jul 15 12:05:50s -0:05:50 -
Rule sol87 1987 only - Jul 16 12:06:00s -0:06:00 -
Rule sol87 1987 only - Jul 17 12:06:05s -0:06:05 -
Rule sol87 1987 only - Jul 18 12:06:10s -0:06:10 -
Rule sol87 1987 only - Jul 19 12:06:15s -0:06:15 -
Rule sol87 1987 only - Jul 20 12:06:15s -0:06:15 -
Rule sol87 1987 only - Jul 21 12:06:20s -0:06:20 -
Rule sol87 1987 only - Jul 22 12:06:25s -0:06:25 -
Rule sol87 1987 only - Jul 23 12:06:25s -0:06:25 -
Rule sol87 1987 only - Jul 24 12:06:25s
-0:06:25 -
Rule sol87 1987 only - Jul 25 12:06:30s -0:06:30 -
Rule sol87 1987 only - Jul 26 12:06:30s -0:06:30 -
Rule sol87 1987 only - Jul 27 12:06:30s -0:06:30 -
Rule sol87 1987 only - Jul 28 12:06:30s -0:06:30 -
Rule sol87 1987 only - Jul 29 12:06:25s -0:06:25 -
Rule sol87 1987 only - Jul 30 12:06:25s -0:06:25 -
Rule sol87 1987 only - Jul 31 12:06:25s -0:06:25 -
Rule sol87 1987 only - Aug 1 12:06:20s -0:06:20 -
Rule sol87 1987 only - Aug 2 12:06:15s -0:06:15 -
Rule sol87 1987 only - Aug 3 12:06:10s -0:06:10 -
Rule sol87 1987 only - Aug 4 12:06:05s -0:06:05 -
Rule sol87 1987 only - Aug 5 12:06:00s -0:06:00 -
Rule sol87 1987 only - Aug 6 12:05:55s -0:05:55 -
Rule sol87 1987 only - Aug 7 12:05:50s -0:05:50 -
Rule sol87 1987 only - Aug 8 12:05:40s -0:05:40 -
Rule sol87 1987 only - Aug 9 12:05:35s -0:05:35 -
Rule sol87 1987 only - Aug 10 12:05:25s -0:05:25 -
Rule sol87 1987 only - Aug 11 12:05:15s -0:05:15 -
Rule sol87 1987 only - Aug 12 12:05:05s -0:05:05 -
Rule sol87 1987 only - Aug 13 12:04:55s
-0:04:55 -
Rule sol87 1987 only - Aug 14 12:04:45s -0:04:45 -
Rule sol87 1987 only - Aug 15 12:04:35s -0:04:35 -
Rule sol87 1987 only - Aug 16 12:04:25s -0:04:25 -
Rule sol87 1987 only - Aug 17 12:04:10s -0:04:10 -
Rule sol87 1987 only - Aug 18 12:04:00s -0:04:00 -
Rule sol87 1987 only - Aug 19 12:03:45s -0:03:45 -
Rule sol87 1987 only - Aug 20 12:03:30s -0:03:30 -

Rule sol87 1987 only - Aug 21 12:03:15s -0:03:15 -
Rule sol87 1987 only - Aug 22 12:03:00s -0:03:00 -
Rule sol87 1987 only - Aug 23 12:02:45s -0:02:45 -
Rule sol87 1987 only - Aug 24 12:02:30s -0:02:30 -
Rule sol87 1987 only - Aug 25 12:02:15s -0:02:15 -
Rule sol87 1987 only - Aug 26 12:02:00s -0:02:00 -
Rule sol87 1987 only - Aug 27 12:01:40s -0:01:40 -
Rule sol87 1987 only - Aug 28 12:01:25s -0:01:25 -
Rule sol87 1987 only - Aug 29 12:01:05s -0:01:05 -
Rule sol87 1987 only - Aug 30 12:00:50s -0:00:50 -
Rule sol87 1987 only - Aug 31 12:00:30s -0:00:30 -
Rule sol87 1987 only - Sep 1 12:00:10s
-0:00:10 -
Rule sol87 1987 only - Sep 2 11:59:50s 0:00:10 -
Rule sol87 1987 only - Sep 3 11:59:35s 0:00:25 -
Rule sol87 1987 only - Sep 4 11:59:15s 0:00:45 -
Rule sol87 1987 only - Sep 5 11:58:55s 0:01:05 -
Rule sol87 1987 only - Sep 6 11:58:35s 0:01:25 -
Rule sol87 1987 only - Sep 7 11:58:15s 0:01:45 -
Rule sol87 1987 only - Sep 8 11:57:55s 0:02:05 -
Rule sol87 1987 only - Sep 9 11:57:30s 0:02:30 -
Rule sol87 1987 only - Sep 10 11:57:10s 0:02:50 -
Rule sol87 1987 only - Sep 11 11:56:50s 0:03:10 -
Rule sol87 1987 only - Sep 12 11:56:30s 0:03:30 -
Rule sol87 1987 only - Sep 13 11:56:10s 0:03:50 -
Rule sol87 1987 only - Sep 14 11:55:45s 0:04:15 -
Rule sol87 1987 only - Sep 15 11:55:25s 0:04:35 -
Rule sol87 1987 only - Sep 16 11:55:05s 0:04:55 -
Rule sol87 1987 only - Sep 17 11:54:45s 0:05:15 -
Rule sol87 1987 only - Sep 18 11:54:20s 0:05:40 -
Rule sol87 1987 only - Sep 19 11:54:00s 0:06:00 -
Rule sol87 1987 only - Sep 20 11:53:40s 0:06:20 -
Rule sol87 1987 only - Sep 21 11:53:15s
0:06:45 -
Rule sol87 1987 only - Sep 22 11:52:55s 0:07:05 -
Rule sol87 1987 only - Sep 23 11:52:35s 0:07:25 -
Rule sol87 1987 only - Sep 24 11:52:15s 0:07:45 -
Rule sol87 1987 only - Sep 25 11:51:55s 0:08:05 -
Rule sol87 1987 only - Sep 26 11:51:35s 0:08:25 -
Rule sol87 1987 only - Sep 27 11:51:10s 0:08:50 -
Rule sol87 1987 only - Sep 28 11:50:50s 0:09:10 -
Rule sol87 1987 only - Sep 29 11:50:30s 0:09:30 -
Rule sol87 1987 only - Sep 30 11:50:10s 0:09:50 -
Rule sol87 1987 only - Oct 1 11:49:50s 0:10:10 -
Rule sol87 1987 only - Oct 2 11:49:35s 0:10:25 -
Rule sol87 1987 only - Oct 3 11:49:15s 0:10:45 -
Rule sol87 1987 only - Oct 4 11:48:55s 0:11:05 -
Rule sol87 1987 only - Oct 5 11:48:35s 0:11:25 -

Rule sol87 1987 only - Oct 6 11:48:20s 0:11:40 -
Rule sol87 1987 only - Oct 7 11:48:00s 0:12:00 -
Rule sol87 1987 only - Oct 8 11:47:45s 0:12:15 -
Rule sol87 1987 only - Oct 9 11:47:25s 0:12:35 -
Rule sol87 1987 only - Oct 10 11:47:10s 0:12:50 -
Rule sol87 1987 only - Oct 11 11:46:55s 0:13:05 -
Rule sol87 1987 only - Oct 12 11:46:40s
0:13:20 -
Rule sol87 1987 only - Oct 13 11:46:25s 0:13:35 -
Rule sol87 1987 only - Oct 14 11:46:10s 0:13:50 -
Rule sol87 1987 only - Oct 15 11:45:55s 0:14:05 -
Rule sol87 1987 only - Oct 16 11:45:45s 0:14:15 -
Rule sol87 1987 only - Oct 17 11:45:30s 0:14:30 -
Rule sol87 1987 only - Oct 18 11:45:20s 0:14:40 -
Rule sol87 1987 only - Oct 19 11:45:05s 0:14:55 -
Rule sol87 1987 only - Oct 20 11:44:55s 0:15:05 -
Rule sol87 1987 only - Oct 21 11:44:45s 0:15:15 -
Rule sol87 1987 only - Oct 22 11:44:35s 0:15:25 -
Rule sol87 1987 only - Oct 23 11:44:25s 0:15:35 -
Rule sol87 1987 only - Oct 24 11:44:20s 0:15:40 -
Rule sol87 1987 only - Oct 25 11:44:10s 0:15:50 -
Rule sol87 1987 only - Oct 26 11:44:05s 0:15:55 -
Rule sol87 1987 only - Oct 27 11:43:55s 0:16:05 -
Rule sol87 1987 only - Oct 28 11:43:50s 0:16:10 -
Rule sol87 1987 only - Oct 29 11:43:45s 0:16:15 -
Rule sol87 1987 only - Oct 30 11:43:45s 0:16:15 -
Rule sol87 1987 only - Oct 31 11:43:40s 0:16:20 -
Rule sol87 1987 only - Nov 1 11:43:40s
0:16:20 -
Rule sol87 1987 only - Nov 2 11:43:35s 0:16:25 -
Rule sol87 1987 only - Nov 3 11:43:35s 0:16:25 -
Rule sol87 1987 only - Nov 4 11:43:35s 0:16:25 -
Rule sol87 1987 only - Nov 5 11:43:35s 0:16:25 -
Rule sol87 1987 only - Nov 6 11:43:40s 0:16:20 -
Rule sol87 1987 only - Nov 7 11:43:40s 0:16:20 -
Rule sol87 1987 only - Nov 8 11:43:45s 0:16:15 -
Rule sol87 1987 only - Nov 9 11:43:50s 0:16:10 -
Rule sol87 1987 only - Nov 10 11:43:55s 0:16:05 -
Rule sol87 1987 only - Nov 11 11:44:00s 0:16:00 -
Rule sol87 1987 only - Nov 12 11:44:05s 0:15:55 -
Rule sol87 1987 only - Nov 13 11:44:15s 0:15:45 -
Rule sol87 1987 only - Nov 14 11:44:20s 0:15:40 -
Rule sol87 1987 only - Nov 15 11:44:30s 0:15:30 -
Rule sol87 1987 only - Nov 16 11:44:40s 0:15:20 -
Rule sol87 1987 only - Nov 17 11:44:50s 0:15:10 -
Rule sol87 1987 only - Nov 18 11:45:05s 0:14:55 -
Rule sol87 1987 only - Nov 19 11:45:15s 0:14:45 -
Rule sol87 1987 only - Nov 20 11:45:30s 0:14:30 -

Rule sol87 1987 only - Nov 21 11:45:45s
0:14:15 -
Rule sol87 1987 only - Nov 22 11:46:00s 0:14:00 -
Rule sol87 1987 only - Nov 23 11:46:15s 0:13:45 -
Rule sol87 1987 only - Nov 24 11:46:30s 0:13:30 -
Rule sol87 1987 only - Nov 25 11:46:50s 0:13:10 -
Rule sol87 1987 only - Nov 26 11:47:10s 0:12:50 -
Rule sol87 1987 only - Nov 27 11:47:25s 0:12:35 -
Rule sol87 1987 only - Nov 28 11:47:45s 0:12:15 -
Rule sol87 1987 only - Nov 29 11:48:05s 0:11:55 -
Rule sol87 1987 only - Nov 30 11:48:30s 0:11:30 -
Rule sol87 1987 only - Dec 1 11:48:50s 0:11:10 -
Rule sol87 1987 only - Dec 2 11:49:10s 0:10:50 -
Rule sol87 1987 only - Dec 3 11:49:35s 0:10:25 -
Rule sol87 1987 only - Dec 4 11:50:00s 0:10:00 -
Rule sol87 1987 only - Dec 5 11:50:25s 0:09:35 -
Rule sol87 1987 only - Dec 6 11:50:50s 0:09:10 -
Rule sol87 1987 only - Dec 7 11:51:15s 0:08:45 -
Rule sol87 1987 only - Dec 8 11:51:40s 0:08:20 -
Rule sol87 1987 only - Dec 9 11:52:05s 0:07:55 -
Rule sol87 1987 only - Dec 10 11:52:30s 0:07:30 -
Rule sol87 1987 only - Dec 11 11:53:00s
0:07:00 -
Rule sol87 1987 only - Dec 12 11:53:25s 0:06:35 -
Rule sol87 1987 only - Dec 13 11:53:55s 0:06:05 -
Rule sol87 1987 only - Dec 14 11:54:25s 0:05:35 -
Rule sol87 1987 only - Dec 15 11:54:50s 0:05:10 -
Rule sol87 1987 only - Dec 16 11:55:20s 0:04:40 -
Rule sol87 1987 only - Dec 17 11:55:50s 0:04:10 -
Rule sol87 1987 only - Dec 18 11:56:20s 0:03:40 -
Rule sol87 1987 only - Dec 19 11:56:50s 0:03:10 -
Rule sol87 1987 only - Dec 20 11:57:20s 0:02:40 -
Rule sol87 1987 only - Dec 21 11:57:50s 0:02:10 -
Rule sol87 1987 only - Dec 22 11:58:20s 0:01:40 -
Rule sol87 1987 only - Dec 23 11:58:50s 0:01:10 -
Rule sol87 1987 only - Dec 24 11:59:20s 0:00:40 -
Rule sol87 1987 only - Dec 25 11:59:50s 0:00:10 -
Rule sol87 1987 only - Dec 26 12:00:20s -0:00:20 -
Rule sol87 1987 only - Dec 27 12:00:45s -0:00:45 -
Rule sol87 1987 only - Dec 28 12:01:15s -0:01:15 -
Rule sol87 1987 only - Dec 29 12:01:45s -0:01:45 -
Rule sol87 1987 only - Dec 30 12:02:15s -0:02:15 -
Rule sol87 1987 only - Dec 31 12:02:45s
-0:02:45 -

Riyadh is at about 46 degrees 46 minutes East: 3 hrs, 7 mins, 4 secs

Before and after 1987, we'll operate on local mean solar time.

Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]

Zone Asia/Riyadh87 3:07:04 - zzz 1987

3:07:04 sol87 zzz 1988

3:07:04 - zzz

For backward compatibility...

Link Asia/Riyadh87 Mideast/Riyadh87

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/solar87

No license file was found, but licenses were detected in source scan.

<pre>

This file is in the public domain, so clarified as of

2009-05-17 by Arthur David Olson.

This file provides links between current names for time zones

and their old names. Many names changed in late 1993.

Link Africa/Asmara Africa/Asmera

Link Africa/Bamako Africa/Timbuktu

Link America/Argentina/Catamarca America/Argentina/ComodRivadavia

Link America/Adak America/Atka

Link America/Argentina/Buenos_Aires America/Buenos_Aires

Link America/Argentina/Catamarca America/Catamarca

Link America/Atikokan America/Coral_Harbour

Link America/Argentina/Cordoba America/Cordoba

Link America/Tijuana America/Ensenada

Link America/Indiana/Indianapolis America/Fort_Wayne

Link America/Indiana/Indianapolis America/Indianapolis

Link America/Argentina/Jujuy America/Jujuy

Link America/Indiana/Knox America/Knox_IN

Link America/Kentucky/Louisville America/Louisville

Link America/Argentina/Mendoza America/Mendoza

Link America/Rio_Branco America/Porto_Acre

Link America/Argentina/Cordoba America/Rosario

Link America/St_Thomas America/Virgin

Link Asia/Ashgabat Asia/Ashkhabad

Link Asia/Chongqing Asia/Chungking

Link Asia/Dhaka Asia/Dacca

Link Asia/Kathmandu Asia/Katmandu

Link Asia/Kolkata Asia/Calcutta

Link Asia/Macau Asia/Macao

Link Asia/Jerusalem Asia/Tel_Aviv

Link Asia/Ho_Chi_Minh Asia/Saigon

Link Asia/Thimphu Asia/Thimbu

Link Asia/Makassar Asia/Ujung_Pandang

Link Asia/Ulaanbaatar Asia/Ulan_Bator

Link Atlantic/Faroe Atlantic/Faeroe
Link Europe/Oslo Atlantic/Jan_Mayen
Link Australia/Sydney Australia/ACT
Link Australia/Sydney Australia/Canberra
Link Australia/Lord_Howe Australia/LHI
Link Australia/Sydney Australia/NSW
Link Australia/Darwin Australia/North
Link Australia/Brisbane Australia/Queensland
Link Australia/Adelaide Australia/South
Link Australia/Hobart Australia/Tasmania
Link Australia/Melbourne Australia/Victoria
Link Australia/Perth Australia/West
Link Australia/Broken_Hill Australia/Yancowinna
Link America/Rio_Branco Brazil/Acre
Link America/Noronha Brazil/DeNoronha
Link America/Sao_Paulo Brazil/East
Link America/Manaus Brazil/West
Link America/Halifax Canada/Atlantic
Link America/Winnipeg Canada/Central
Link America/Regina Canada/East-Saskatchewan
Link America/Toronto Canada/Eastern
Link America/Edmonton Canada/Mountain
Link America/St_Johns Canada/Newfoundland
Link America/Vancouver Canada/Pacific
Link America/Regina Canada/Saskatchewan
Link America/Whitehorse Canada/Yukon
Link America/Santiago Chile/Continental
Link Pacific/Easter Chile/EasterIsland
Link America/Havana Cuba
Link Africa/Cairo Egypt
Link Europe/Dublin Eire
Link Europe/London Europe/Belfast
Link Europe/Chisinau Europe/Tiraspol
Link Europe/London GB
Link Europe/London GB-Eire
Link Etc/GMT GMT+0
Link Etc/GMT GMT-0
Link Etc/GMT GMT0
Link Etc/GMT Greenwich
Link Asia/Hong_Kong Hongkong
Link Atlantic/Reykjavik Iceland
Link Asia/Tehran Iran
Link Asia/Jerusalem Israel
Link America/Jamaica Jamaica
Link Asia/Tokyo Japan
Link Pacific/Kwajalein Kwajalein
Link Africa/Tripoli Libya
Link America/Tijuana Mexico/BajaNorte

Link America/Mazatlan Mexico/BajaSur
Link America/Mexico_City Mexico/General
Link Pacific/Auckland NZ
Link Pacific/Chatham NZ-CHAT
Link America/Denver Navajo
Link Asia/Shanghai PRC
Link Pacific/Pago_Pago Pacific/Samoa
Link Pacific/Chuuk Pacific/Yap
Link Pacific/Chuuk Pacific/Truk
Link Pacific/Pohnpei Pacific/Ponape
Link Europe/Warsaw Poland
Link Europe/Lisbon Portugal
Link Asia/Taipei ROC
Link Asia/Seoul ROK
Link Asia/Singapore Singapore
Link Europe/Istanbul Turkey
Link Etc/UCT UCT
Link America/Anchorage US/Alaska
Link America/Adak US/Aleutian
Link America/Phoenix US/Arizona
Link America/Chicago US/Central
Link America/Indiana/Indianapolis US/East-Indiana
Link America/New_York US/Eastern
Link Pacific/Honolulu US/Hawaii
Link America/Indiana/Knox US/Indiana-Starke
Link America/Detroit US/Michigan
Link America/Denver US/Mountain
Link America/Los_Angeles US/Pacific
Link Pacific/Pago_Pago US/Samoa
Link Etc/UTC UTC
Link Etc/UTC Universal
Link Europe/Moscow W-SU
Link Etc/UTC Zulu

Found

in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/backward
No license file was found, but licenses were detected in source scan.

/*

* Copyright 2000-2005 Sun Microsystems, Inc. All Rights Reserved.
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
*
* This code is free software; you can redistribute it and/or modify it
* under the terms of the GNU General Public License version 2 only, as
* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided

```
* by Sun in the LICENSE file that accompanied this code.
*
* This code is distributed in the hope that it will be useful, but WITHOUT
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
* version 2 for more details (a copy is included in the LICENSE file that
* accompanied this code).
*
* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to
the Free Software Foundation,
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
*
* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
* CA 95054 USA or visit www.sun.com if you need additional information or
* have any questions.
*/
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/util/calendar/Gregorian.java
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/util/calendar/ZoneInfo.java
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/util/calendar/CalendarSystem.java
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/tools/javazic/Gen.java
```

No license file was found, but licenses were detected in source scan.

```
# <pre>
```

```
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.
```

```
# This data is by no means authoritative; if you think you know better,
# go ahead and edit the file (and please send any changes to
# tz@iana.org for general use in the future).
```

```
# From Paul Eggert (2013-02-21):
```

```
#
```

```
# A good source for time zone historical data outside the U.S. is
# Thomas G. Shanks and Rique Pottenger, The International Atlas (6th edition),
# San Diego: ACS Publications, Inc. (2003).
```

```
#
```

```
# Gwillim Law writes that a good source
# for recent time zone data is the International Air Transport
# Association's Standard Schedules Information Manual (IATA SSIM),
# published semiannually. Law sent in several helpful summaries
# of the IATA's data after 1990.
```

```

#
# Except where otherwise noted, Shanks & Pottenger is the source for
# entries through 1990, and IATA SSIM is the source for entries afterwards.
#
# Another
# source occasionally used is Edward W. Whitman, World Time Differences,
# Whitman Publishing Co, 2 Niagara Av, Ealing, London (undated), which
# I found in the UCLA library.
#
# For data circa 1899, a common source is:
# Milne J. Civil time. Geogr J. 1899 Feb;13(2):173-94
# <http://www.jstor.org/stable/1774359>.
#
# A reliable and entertaining source about time zones is
# Derek Howse, Greenwich time and longitude, Philip Wilson Publishers (1997).
#
# I invented the abbreviations marked `*' in the following table;
# the rest are from earlier versions of this file, or from other sources.
# Corrections are welcome!
#   std dst
#   LMT Local Mean Time
# 2:00 EET EEST Eastern European Time
# 2:00 IST IDT Israel
# 3:00 AST ADT Arabia*
# 3:30 IRST IRDT Iran
# 4:00 GST Gulf*
# 5:30 IST India
# 7:00 ICT Indochina*
# 7:00 WIT west Indonesia
# 8:00 CIT central Indonesia
# 8:00 CST China
# 9:00 CJT Central Japanese Time (1896/1937)*
# 9:00 EIT east Indonesia
# 9:00 JST JDT Japan
# 9:00
#   KST KDT Korea
# 9:30 CST (Australian) Central Standard Time
#
# See the `europe' file for Russia and Turkey in Asia.

# From Guy Harris:
# Incorporates data for Singapore from Robert Elz' asia 1.1, as well as
# additional information from Tom Yap, Sun Microsystems Intercontinental
# Technical Support (including a page from the Official Airline Guide -
# Worldwide Edition). The names for time zones are guesses.

#####

```

```

# These rules are stolen from the `europe' file.
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule EUAsia 1981 max - Mar lastSun 1:00u 1:00 S
Rule EUAsia 1979 1995 - Sep lastSun 1:00u 0 -
Rule EUAsia 1996 max - Oct lastSun 1:00u 0 -
Rule E-EurAsia 1981 max - Mar lastSun 0:00 1:00 S
Rule E-EurAsia 1979 1995 - Sep lastSun 0:00 0 -
Rule E-EurAsia 1996 max - Oct lastSun 0:00 0 -
Rule RussiaAsia 1981 1984 - Apr 1 0:00 1:00 S
Rule RussiaAsia 1981 1983 - Oct 1 0:00 0 -
Rule RussiaAsia 1984 1991 - Sep lastSun
2:00s 0 -
Rule RussiaAsia 1985 1991 - Mar lastSun 2:00s 1:00 S
Rule RussiaAsia 1992 only - Mar lastSat 23:00 1:00 S
Rule RussiaAsia 1992 only - Sep lastSat 23:00 0 -
Rule RussiaAsia 1993 max - Mar lastSun 2:00s 1:00 S
Rule RussiaAsia 1993 1995 - Sep lastSun 2:00s 0 -
Rule RussiaAsia 1996 max - Oct lastSun 2:00s 0 -

# Afghanistan
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Kabul 4:36:48 - LMT 1890
4:00 - AFT 1945
4:30 - AFT

# Armenia
# From Paul Eggert (2006-03-22):
# Shanks & Pottenger have Yerevan switching to 3:00 (with Russian DST)
# in spring 1991, then to 4:00 with no DST in fall 1995, then
# readopting Russian DST in 1997. Go with Shanks & Pottenger, even
# when they disagree with others. Edgar Der-Danieliantz
# reported (1996-05-04) that Yerevan probably wouldn't use DST
# in 1996, though it did use DST in 1995. IATA SSIM (1991/1998) reports that
# Armenia switched from 3:00 to 4:00 in 1998 and observed DST after 1991,
# but started switching
# at 3:00s in 1998.

# From Arthur David Olson (2011-06-15):
# While Russia abandoned DST in 2011, Armenia may choose to
# follow Russia's "old" rules.

# From Alexander Krivenyshev (2012-02-10):
# According to News Armenia, on Feb 9, 2012,
# http://newsarmenia.ru/society/20120209/42609695.html
#
# The Armenia National Assembly adopted final reading of Amendments to the
# Law "On procedure of calculation time on the territory of the Republic of
# Armenia" according to which Armenia [is] abolishing Daylight Saving Time.

```

```

# or
# (brief)
# http://www.worldtimezone.com/dst_news/dst_news_armenia03.html
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Yerevan 2:58:00 - LMT 1924 May 2
  3:00 - YERT 1957 Mar # Yerevan Time
  4:00 RussiaAsia YER%ST 1991 Mar 31 2:00s
  3:00 1:00 YERST 1991 Sep 23 # independence
  3:00 RussiaAsia AM%ST 1995 Sep 24 2:00s
  4:00 - AMT 1997
  4:00 RussiaAsia AM%ST 2012 Mar 25 2:00s
  4:00 - AMT

# Azerbaijan
# From Rustam Aliyev of the Azerbaijan Internet
  Forum (2005-10-23):
# According to the resolution of Cabinet of Ministers, 1997
# Resolution available at: http://aif.az/docs/daylight_res.pdf
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Azer 1997 max - Mar lastSun 4:00 1:00 S
Rule Azer 1997 max - Oct lastSun 5:00 0 -
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Baku 3:19:24 - LMT 1924 May 2
  3:00 - BAKT 1957 Mar # Baku Time
  4:00 RussiaAsia BAK%ST 1991 Mar 31 2:00s
  3:00 1:00 BAKST 1991 Aug 30 # independence
  3:00 RussiaAsia AZ%ST 1992 Sep lastSat 23:00
  4:00 - AZT 1996 # Azerbaijan time
  4:00 EUAsia AZ%ST 1997
  4:00 Azer AZ%ST

# Bahrain
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Bahrain 3:22:20 - LMT 1920 # Al Manamah
  4:00 - GST 1972 Jun
  3:00 - AST

# Bangladesh
# From Alexander Krivenyshev (2009-05-13):
# According to newspaper Asian Tribune (May 6, 2009) Bangladesh may introduce
# Daylight Saving Time from June 16 to Sept 30
#
# Bangladesh to introduce daylight saving time likely
  from June 16
# <a href="http://www.asiantribune.com/?q=node/17288">
# http://www.asiantribune.com/?q=node/17288
# </a>
# or

```


http://www.worldtimezone.com/dst_news/dst_news_bangladesh02.html

"... Bangladesh government has decided to switch daylight saving time from
June
16 till September 30 in a bid to ensure maximum use of daylight to cope with
crippling power crisis. "

The switch will remain in effect from June 16 to Sept 30 (2009) but if
implemented the next year, it will come in force from April 1, 2010

From Steffen Thorsen (2009-06-02):
They have finally decided now, but changed the start date to midnight between
the 19th and 20th, and they have not set the end date yet.

Some sources:

http://in.reuters.com/article/southAsiaNews/idINIndia-40017620090601

http://bdnews24.com/details.php?id=85889&cid=2

Our wrap-up:

http://www.timeanddate.com/news/time/bangladesh-daylight-saving-2009.html

From A. N. M. Kamrus Saadat (2009-06-15):
Finally we've got the official mail regarding DST start time where DST start
time is mentioned as Jun 19 2009, 23:00 from BTRC (Bangladesh
Telecommunication Regulatory Commission).

No DST end date has been announced yet.

From Alexander Krivenyshev (2009-09-25):
Bangladesh won't go back to Standard Time from October 1, 2009,
instead it will continue DST measure till the cabinet makes a fresh decision.

Following report by same newspaper-"The Daily Star Friday":
"DST change awaits cabinet decision-Clock won't go back by 1-hr from Oct 1"

http://www.thedailystar.net/newDesign/news-details.php?nid=107021

or

http://www.worldtimezone.com/dst_news/dst_news_bangladesh04.html

From Steffen Thorsen (2009-10-13):

IANS (Indo-Asian News Service) now reports:

Bangladesh has decided that the clock advanced by an hour to make
maximum use of daylight hours as an energy saving measure would
"continue for an indefinite period."

#

One of many places where it is published:

http://www.thaindian.com/newsportal/business/bangladesh-to-continue-indefinitely-with-advanced-time_100259987.html

From Alexander Krivenyshev (2009-12-24):

According to Bangladesh newspaper "The Daily Star,"

Bangladesh will change its clock back to Standard Time on Dec 31, 2009.

#

Clock goes back 1-hr on Dec 31 night.

#

http://www.thedailystar.net/newDesign/news-details.php?nid=119228

and

http://www.worldtimezone.com/dst_news/dst_news_bangladesh05.html

#

"...The government yesterday decided to put the clock back by one hour

on December 31 midnight and the new time will continue until March 31,

2010 midnight. The decision came at a cabinet meeting at the Prime

Minister's Office last night..."

From Alexander Krivenyshev (2010-03-22):

According to Bangladesh newspaper "The Daily Star,"

Cabinet cancels Daylight Saving Time

http://www.thedailystar.net/newDesign/latest_news.php?nid=22817

or

http://www.worldtimezone.com/dst_news/dst_news_bangladesh06.html

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Dhaka 2009 only - Jun 19 23:00 1:00 S

Rule Dhaka 2009 only - Dec 31 23:59 0 -

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Dhaka 6:01:40 - LMT 1890

5:53:20 - HMT 1941 Oct # Howrah Mean Time?

6:30 - BURT 1942 May 15 # Burma Time

5:30 - IST 1942 Sep

6:30 - BURT 1951 Sep 30

6:00 - DACT 1971 Mar 26 # Dacca Time

6:00 - BDT 2009

6:00 Dhaka BD%ST

Bhutan

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Thimphu 5:58:36 - LMT 1947 Aug 15 # or Thimbu

5:30 - IST 1987 Oct

6:00 - BTT # Bhutan Time

British Indian Ocean Territory

Whitman and the 1995 CIA time zone map say 5:00, but the

1997 and later maps say 6:00. Assume the switch occurred in 1996.

We have no information as to when standard time was introduced;

assume it occurred in 1907, the same year as Mauritius (which

then contained the Chagos Archipelago).

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Indian/Chagos 4:49:40 - LMT 1907

5:00 - IOT 1996 # BIOT Time

6:00 - IOT

#

Brunei

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Brunei 7:39:40 - LMT 1926 Mar # Bandar Seri Begawan

7:30 - BNT 1933

8:00 - BNT

Burma / Myanmar

Milne says 6:24:40 was the meridian of the time ball observatory at Rangoon.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Rangoon 6:24:40 - LMT 1880 # or Yangon

6:24:40 - RMT 1920 # Rangoon Mean Time?

6:30 - BURT 1942 May # Burma Time

9:00 - JST 1945 May 3

6:30 - MMT # Myanmar Time

```

# Cambodia
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Phnom_Penh 6:59:40 - LMT 1906 Jun 9
  7:06:20 - SMT 1911 Mar 11 0:01 # Saigon MT?
  7:00 - ICT 1912 May
  8:00 - ICT 1931 May
  7:00 - ICT

# China

# From Guy Harris:
# People's Republic of China. Yes, they really have only one time zone.

# From Bob Devine (1988-01-28):
# No they don't. See TIME mag, 1986-02-17 p.52. Even though
# China is across 4 physical time zones, before Feb 1, 1986 only the
# Peking (Bejing) time zone
  was recognized. Since that date, China
# has two of 'em -- Peking's and Urumqi (named after the capital of
# the Xinjiang Uyghur Autonomous Region). I don't know about DST for it.
#
# . . . I just deleted the DST table and this editor makes it too
# painful to suck in another copy.. So, here is what I have for
# DST start/end dates for Peking's time zone (info from AP):
#
#   1986 May 4 - Sept 14
#   1987 mid-April - ??

# From U. S. Naval Observatory (1989-01-19):
# CHINA      8 H AHEAD OF UTC ALL OF CHINA, INCL TAIWAN
# CHINA      9 H AHEAD OF UTC APR 17 - SEP 10

# From Paul Eggert (2006-03-22):
# Shanks & Pottenger write that China (except for Hong Kong and Macau)
# has had a single time zone since 1980 May 1, observing summer DST
# from 1986 through 1991; this contradicts Devine's
# note about Time magazine, though apparently _something_ happened in 1986.
# Go with Shanks & Pottenger for now. I made up names for the other
# pre-1980 time zones.

# From
  Shanks & Pottenger:
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Shang 1940 only - Jun 3 0:00 1:00 D
Rule Shang 1940 1941 - Oct 1 0:00 0 S
Rule Shang 1941 only - Mar 16 0:00 1:00 D
Rule PRC 1986 only - May 4 0:00 1:00 D

```

Rule PRC 1986 1991 - Sep Sun>=11 0:00 0 S
Rule PRC 1987 1991 - Apr Sun>=10 0:00 1:00 D

From Anthony Fok (2001-12-20):
BTW, I did some research on-line and found some info regarding these five
historic timezones from some Taiwan websites. And yes, there are official
Chinese names for these locales (before 1949).

From Jesper Norgaard Welen (2006-07-14):
I have investigated the timezones around 1970 on the
<http://www.astro.com/atlas> site [with provinces and county
boundaries summarized below].... A few other exceptions were two
counties on the Sichuan side of the Xizang-Sichuan border,
counties Dege and Baiyu which lies on the Sichuan side and are
therefore supposed to be GMT+7, Xizang region being GMT+6, but Dege
county is GMT+8 according
to astro.com while Baiyu county is GMT+6
(could be true), for the moment I am assuming that those two
counties are mistakes in the astro.com data.

From Paul Eggert (2008-02-11):
I just now checked Google News for western news sources that talk
about China's single time zone, and couldn't find anything before 1986
talking about China being in one time zone. (That article was: Jim
Mann, "A clumsy embrace for another western custom: China on daylight
time--sort of", Los Angeles Times, 1986-05-05. By the way, this
article confirms the tz database's data claiming that China began
observing daylight saving time in 1986.

From Thomas S. Mullaney (2008-02-11):
I think you're combining two subjects that need to be treated
separately: daylight savings (which, you're correct, wasn't
implemented until the 1980s) and the unified time zone centered near
Beijing (which was implemented in 1949). Briefly, there was also a
"Lhasa Time" in Tibet and "Urumqi Time"
in Xinjiang. The first was
ceased, and the second eventually recognized (again, in the 1980s).

From Paul Eggert (2008-06-30):
There seems to be a good chance China switched to a single time zone in 1949
rather than in 1980 as Shanks & Pottenger have it, but we don't have a
reliable documentary source saying so yet, so for now we still go with
Shanks & Pottenger.

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Changbai Time ("Long-white Time", Long-white = Heilongjiang area)
Heilongjiang (except Mohe county), Jilin
Zone Asia/Harbin 8:26:44 - LMT 1928 # or Haerbin

8:30 - CHAT 1932 Mar # Changbai Time
 8:00 - CST 1940
 9:00 - CHAT 1966 May
 8:30 - CHAT 1980 May
 8:00 PRC C%ST
 # Zhongyuan Time ("Central plain Time")
 # most of China
 # Milne gives 8:05:56.7; round to nearest.
 Zone Asia/Shanghai 8:05:57 - LMT 1928
 8:00 Shang C%ST 1949
 8:00 PRC C%ST
 # Long-shu Time (probably due to Long and Shu being two names of that area)
 # Guangxi, Guizhou, Hainan, Ningxia, Sichuan,
 Shaanxi, and Yunnan;
 # most of Gansu; west Inner Mongolia; west Qinghai; and the Guangdong
 # counties Deqing, Enping, Kaiping, Luoding, Taishan, Xinxing,
 # Yangchun, Yangjiang, Yu'nan, and Yunfu.
 Zone Asia/Chongqing 7:06:20 - LMT 1928 # or Chungking
 7:00 - LONT 1980 May # Long-shu Time
 8:00 PRC C%ST
 # Xin-zang Time ("Xinjiang-Tibet Time")
 # The Gansu counties Aksay, Anxi, Dunhuang, Subei; west Qinghai;
 # the Guangdong counties Xuwen, Haikang, Suixi, Lianjiang,
 # Zhanjiang, Wuchuan, Huazhou, Gaozhou, Maoming, Dianbai, and Xinyi;
 # east Tibet, including Lhasa, Chamdo, Shigaise, Jimsar, Shawan and Hutubi;
 # east Xinjiang, including Urumqi, Turpan, Karamay, Korla, Minfeng, Jinghe,
 # Wusu, Qiemo, Xinyan, Wulanwusu, Jinghe, Yumin, Tacheng, Tuoli, Emin,
 # Shihezi, Changji, Yanqi, Heshuo, Tuokexun, Tulufan, Shanshan, Hami,
 # Fukang, Kuitun, Kumukuli, Miqan, Qitai, and Turfan.
 Zone Asia/Urumqi 5:50:20 - LMT 1928 # or Urumchi
 6:00 - URUT 1980 May # Urumqi Time
 8:00 PRC C%ST
 #
 Kunlun Time
 # West Tibet, including Pulan, Aheqi, Shufu, Shule;
 # West Xinjiang, including Aksu, Atushi, Yining, Hetian, Cele, Luopu, Nileke,
 # Zhaosu, Tekesi, Gongliu, Chabuhaer, Huocheng, Bole, Pishan, Suiding,
 # and Yarkand.

 # From Luther Ma (2009-10-17):
 # Almost all (>99.9%) ethnic Chinese (properly ethnic Han) living in
 # Xinjiang use Chinese Standard Time. Some are aware of Xinjiang time,
 # but have no need of it. All planes, trains, and schools function on
 # what is called "Beijing time." When Han make an appointment in Chinese
 # they implicitly use Beijing time.
 #
 # On the other hand, ethnic Uyghurs, who make up about half the
 # population of Xinjiang, typically use "Xinjiang time" which is two

hours behind Beijing time, or UTC +0600. The government of the Xinjiang
Uyghur Autonomous Region, (XAUR, or just Xinjiang for short) as well as
local governments such as the Urumqi city government use both times in
publications, referring to what is popularly called Xinjiang
time as
"Urumqi time." When Uyghurs make an appointment in the Uyghur language
they almost invariably use Xinjiang time.

(Their ethnic Han compatriots would typically have no clue of its
widespread use, however, because so extremely few of them are fluent in
Uyghur, comparable to the number of Anglo-Americans fluent in Navajo.)

(...As with the rest of China there was a brief interval ending in 1990
or 1991 when summer time was in use. The confusion was severe, with
the province not having dual times but four times in use at the same
time. Some areas remained on standard Xinjiang time or Beijing time and
others moving their clocks ahead.)

...an example of an official website using of Urumqi time.

The first few lines of the Google translation of

http://www.fjysgl.gov.cn/show.aspx?id=2379&cid=39

(retrieved 2009-10-13)
> Urumqi fire seven people are missing the alleged losses of at
least
> 500 million yuan
>
> (Reporter Dong Liu) the day before 20:20 or so (Urumqi Time 18:20),
> Urumqi City Department of International Plaza Luther Qiantang River
> burst fire. As of yesterday, 18:30, Urumqi City Fire officers and men
> have worked continuously for 22 hours...

From Luther Ma (2009-11-19):
With the risk of being redundant to previous answers these are the most common
English "transliterations" (w/o using non-English symbols):

1. Wulumuqi...
2. Kashi...
3. Urumqi...
4. Kashgar...
...
5. It seems that Uyghurs in Urumqi has been using Xinjiang since at least the
1960's. I know of one Han, now over 50, who grew up in the surrounding
countryside and used Xinjiang time as a child.

6. Likewise for Kashgar and the rest of south Xinjiang I don't know of any

start date for Xinjiang time.

Without having access to local historical records, nor the ability to legally
publish them, I would go with October 1, 1949, when Xinjiang became
the Uyghur
Autonomous Region under the PRC. (Before that Uyghurs, of course, would also
not be using Beijing time, but some local time.)

Zone Asia/Kashgar 5:03:56 - LMT 1928 # or Kashi or Kaxgar
5:30 - KAST 1940 # Kashgar Time
5:00 - KAST 1980 May
8:00 PRC C%sT

Hong Kong (Xianggang)

Milne gives 7:36:41.7; round this.

From Lee Yiu Chung (2009-10-24):
I found there are some mistakes for the...DST rule for Hong
Kong. [According] to the DST record from Hong Kong Observatory (actually,
it is not [an] observatory, but the official meteorological agency of HK,
and also serves as the official timing agency), there are some missing
and incorrect rules. Although the exact switch over time is missing, I
think 3:30 is correct. The official DST record for Hong Kong can be
obtained from

http://www.hko.gov.hk/gts/time/Summertime.htm
.

From Arthur David Olson (2009-10-28):
Here are the dates
given at

http://www.hko.gov.hk/gts/time/Summertime.htm

as of 2009-10-28:

# Year	Period
# 1941	1 Apr to 30 Sep
# 1942	Whole year
# 1943	Whole year
# 1944	Whole year
# 1945	Whole year
# 1946	20 Apr to 1 Dec
# 1947	13 Apr to 30 Dec
# 1948	2 May to 31 Oct
# 1949	3 Apr to 30 Oct
# 1950	2 Apr to 29 Oct

1951 1 Apr to 28 Oct
 # 1952 6 Apr to 25 Oct
 # 1953 5 Apr to 1 Nov
 # 1954 21 Mar to 31 Oct
 # 1955 20 Mar to 6 Nov
 # 1956 18 Mar to 4 Nov
 # 1957 24 Mar to 3 Nov
 # 1958 23 Mar to 2 Nov
 # 1959 22 Mar to 1 Nov
 # 1960 20 Mar to 6 Nov
 # 1961 19 Mar to 5 Nov
 # 1962 18 Mar to 4 Nov
 # 1963 24 Mar to 3 Nov
 # 1964 22 Mar to 1 Nov
 # 1965 18 Apr to 17 Oct
 # 1966 17 Apr to 16 Oct
 # 1967 16 Apr to 22 Oct
 # 1968 21 Apr to 20 Oct
 # 1969

20 Apr to 19 Oct

1970 19 Apr to 18 Oct
 # 1971 18 Apr to 17 Oct
 # 1972 16 Apr to 22 Oct
 # 1973 22 Apr to 21 Oct
 # 1973/74 30 Dec 73 to 20 Oct 74
 # 1975 20 Apr to 19 Oct
 # 1976 18 Apr to 17 Oct
 # 1977 Nil
 # 1978 Nil
 # 1979 13 May to 21 Oct
 # 1980 to Now Nil

The page does not give start or end times of day.

The page does not give a start date for 1942.

The page does not give an end date for 1945.

The Japanese occupation of Hong Kong began on 1941-12-25.

The Japanese surrender of Hong Kong was signed 1945-09-15.

For lack of anything better, use start of those days as the transition times.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule HK 1941 only - Apr 1 3:30 1:00 S

Rule HK 1941 only - Sep 30 3:30 0 -

Rule HK 1946 only - Apr 20 3:30 1:00 S

Rule HK 1946 only - Dec 1 3:30 0 -

Rule HK 1947 only - Apr 13 3:30 1:00 S

Rule HK 1947 only - Dec 30 3:30 0 -

Rule HK 1948 only - May 2 3:30 1:00 S

Rule HK 1948 1951 - Oct lastSun 3:30 0 -

Rule HK 1952 only - Oct 25 3:30 0 -

Rule HK 1949 1953 - Apr Sun>=1 3:30 1:00 S
 Rule HK 1953 only - Nov 1 3:30 0 -
 Rule HK 1954 1964 - Mar Sun>=18 3:30 1:00 S
 Rule HK 1954 only - Oct 31 3:30 0 -
 Rule HK 1955 1964 - Nov Sun>=1 3:30 0 -
 Rule HK 1965 1976 - Apr Sun>=16 3:30 1:00 S
 Rule HK 1965 1976 - Oct Sun>=16 3:30 0 -
 Rule HK 1973 only - Dec 30 3:30 1:00 S
 Rule HK 1979 only - May Sun>=8 3:30 1:00 S
 Rule HK 1979 only - Oct Sun>=16 3:30 0 -

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Hong_Kong 7:36:42 - LMT 1904 Oct 30

8:00 HK HK%sT 1941 Dec 25

9:00 - JST 1945 Sep 15

8:00 HK HK%sT

#####

Taiwan

Shanks & Pottenger write that Taiwan observed DST during 1945, when it
 # was still controlled by Japan. This is hard to believe, but we don't
 # have any other information.

From smallufo (2010-04-03):

According to Taiwan's CWB,

#

http://www.cwb.gov.tw/V6/astromy/cdata/summert.htm

Taipei has DST in 1979 between July 1st and Sep 30.

From Arthur David Olson (2010-04-07):

Here's Google's translation of the table at the bottom of the "summert.htm" page:

# Decade	Name	Start and end date
# Republic of China 34 years to 40 years (AD 1945-1951 years)	Summer Time	May 1 to September 30
# 41 years of the Republic of China (AD 1952)	Daylight Saving Time	March 1 to October 31
# Republic of China 42 years to 43 years (AD 1953-1954 years)	Daylight Saving Time	April 1 to October 31
# In the 44 years to 45 years (AD 1955-1956 years)	Daylight Saving Time	April 1 to September 30
# Republic of China 46 years to 48 years (AD 1957-1959)	Summer Time	April 1 to September 30
# Republic of China 49 years to 50 years (AD 1960-1961)	Summer Time	June 1 to September 30
# Republic of China 51 years to 62 years (AD 1962-1973 years)	Stop Summer Time	
# Republic of China 63 years to 64 years (1974-1975 AD)	Daylight Saving Time	April 1 to September 30
# Republic of China 65 years to 67 years (1976-1978 AD)	Stop Daylight Saving Time	
# Republic of China 68 years (AD 1979)	Daylight Saving Time	July 1 to September 30
# Republic of China since 69 years (AD 1980)	Stop Daylight Saving Time	

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Taiwan 1945 1951 - May 1 0:00 1:00 D
Rule Taiwan 1945 1951 - Oct 1 0:00 0 S
Rule Taiwan 1952 only - Mar 1 0:00 1:00 D
Rule Taiwan 1952 1954 - Nov 1 0:00 0 S
Rule Taiwan 1953 1959 - Apr 1 0:00 1:00 D
Rule Taiwan 1955 1961 - Oct 1 0:00 0 S
Rule Taiwan 1960 1961 - Jun 1 0:00 1:00 D
Rule Taiwan 1974 1975 - Apr 1 0:00 1:00 D
Rule Taiwan 1974 1975 - Oct 1 0:00 0 S
Rule Taiwan 1979 only - Jun 30 0:00 1:00 D
Rule Taiwan 1979 only - Sep 30 0:00 0 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Taipei 8:06:00 - LMT 1896 # or Taipei or T'ai-pei
8:00 Taiwan C%sT

Macau (Macao, Aomen)
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Macau 1961 1962 - Mar Sun>=16 3:30 1:00 S
Rule Macau 1961 1964 - Nov Sun>=1 3:30 0 -
Rule Macau 1963 only - Mar Sun>=16 0:00 1:00 S
Rule Macau 1964 only - Mar Sun>=16 3:30 1:00 S
Rule Macau 1965 only - Mar Sun>=16 0:00 1:00 S
Rule Macau 1965 only - Oct 31 0:00 0 -
Rule Macau 1966 1971 - Apr Sun>=16 3:30 1:00 S
Rule Macau 1966 1971 - Oct Sun>=16 3:30 0 -
Rule Macau 1972 1974 - Apr Sun>=15 0:00 1:00 S
Rule Macau 1972 1973 - Oct Sun>=15 0:00 0 -
Rule Macau 1974 1977 - Oct Sun>=15 3:30 0 -
Rule Macau 1975 1977 - Apr Sun>=15 3:30 1:00 S
Rule Macau 1978 1980 - Apr Sun>=15 0:00 1:00 S
Rule Macau 1978 1980 - Oct Sun>=15 0:00 0 -
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Macau 7:34:20 - LMT 1912
8:00 Macau MO%sT 1999 Dec 20 # return to China
8:00 PRC C%sT

#####

Cyprus

Milne says the Eastern Telegraph Company used 2:14:00. Stick with LMT.
#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Cyprus 1975 only - Apr 13 0:00 1:00 S
Rule Cyprus 1975 only - Oct 12 0:00 0 -
Rule Cyprus 1976 only - May 15 0:00 1:00 S
Rule Cyprus 1976 only - Oct 11 0:00 0 -
Rule Cyprus 1977 1980 - Apr Sun>=1 0:00 1:00 S
Rule Cyprus 1977 only - Sep 25 0:00 0 -
Rule Cyprus 1978 only - Oct 2 0:00 0 -
Rule Cyprus 1979 1997 - Sep lastSun 0:00 0 -
Rule Cyprus 1981 1998 - Mar lastSun 0:00 1:00 S
Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Nicosia 2:13:28 - LMT 1921 Nov 14
2:00 Cyprus EE%sT 1998 Sep
2:00 EUAsia EE%sT
IATA SSIM (1998-09) has Cyprus using EU rules for the first time.

Classically, Cyprus belongs to Asia; e.g. see Herodotus, Histories, I.72.
However, for various reasons many users expect to find it under Europe.
Link Asia/Nicosia Europe/Nicosia

Georgia

From Paul Eggert

(1994-11-19):

Today's _Economist_ (p 60) reports that Georgia moved its clocks forward
an hour recently, due to a law proposed by Zurab Murvanidze,
an MP who went on a hunger strike for 11 days to force discussion about it!
We have no details, but we'll guess they didn't move the clocks back in fall.
#

From Mathew Englander, quoting AP (1996-10-23 13:05-04):

Instead of putting back clocks at the end of October, Georgia
will stay on daylight savings time this winter to save energy,
President Eduard Shevardnadze decreed Wednesday.

#

From the BBC via Joseph S. Myers (2004-06-27):

#

Georgia moved closer to Western Europe on Sunday... The former Soviet
republic has changed its time zone back to that of Moscow. As a result it
is now just four hours ahead of Greenwich Mean Time, rather than five hours
ahead. The switch was decreed by the pro-Western president of Georgia,
Mikhail Saakashvili, who said the change was partly prompted by the process
of integration
into Europe.

From Teimuraz Abashidze (2005-11-07):

Government of Georgia ... decided to NOT CHANGE daylight savings time on
[Oct.] 30, as it was done before during last more than 10 years.
Currently, we are in fact GMT +4:00, as before 30 October it was GMT
+3:00.... The problem is, there is NO FORMAL LAW or governmental document

about it. As far as I can find, I was told, that there is no document,
because we just DIDN'T ISSUE document about switching to winter time....
I don't know what can be done, especially knowing that some years ago our
DST rules where changed THREE TIMES during one month.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Tbilisi 2:59:16 - LMT 1880

2:59:16 - TBMT 1924 May 2 # Tbilisi Mean Time

3:00 - TBIT 1957 Mar # Tbilisi Time

4:00 RussiaAsia TBI%sT 1991 Mar 31 2:00s

3:00 1:00 TBIST 1991 Apr 9 # independence

3:00 RussiaAsia GE%sT 1992 # Georgia Time

3:00 E-EurAsia GE%sT 1994 Sep lastSun

4:00 E-EurAsia GE%sT 1996

Oct lastSun

4:00 1:00 GEST 1997 Mar lastSun

4:00 E-EurAsia GE%sT 2004 Jun 27

3:00 RussiaAsia GE%sT 2005 Mar lastSun 2:00

4:00 - GET

East Timor

See Indonesia for the 1945 transition.

From Joao Carrascalao, brother of the former governor of East Timor, in

East Timor may be late for its millennium

 (1999-12-26/31):

Portugal tried to change the time forward in 1974 because the sun

rises too early but the suggestion raised a lot of problems with the

Timorese and I still don't think it would work today because it

conflicts with their way of life.

From Paul Eggert (2000-12-04):

We don't have any record of the above attempt.

Most likely our records are incomplete, but we have no better data.

From Manoel de Almeida e Silva, Deputy Spokesman for the UN Secretary-General

(2000-08-16):

The Cabinet of the

East Timor Transition Administration decided

today to advance East Timor's time by one hour. The time change,

which will be permanent, with no seasonal adjustment, will happen at

midnight on Saturday, September 16.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Dili 8:22:20 - LMT 1912
 8:00 - TLT 1942 Feb 21 23:00 # E Timor Time
 9:00 - JST 1945 Sep 23
 9:00 - TLT 1976 May 3
 8:00 - CIT 2000 Sep 17 00:00
 9:00 - TLT

India
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Asia/Kolkata 5:53:28 - LMT 1880 # Kolkata
 5:53:20 - HMT 1941 Oct # Howrah Mean Time?
 6:30 - BURT 1942 May 15 # Burma Time
 5:30 - IST 1942 Sep
 5:30 1:00 IST 1945 Oct 15
 5:30 - IST
 # The following are like Asia/Kolkata:
 # Andaman Is
 # Lakshadweep (Laccadive, Minicoy and Amindivi Is)
 # Nicobar Is

Indonesia
 #
 # From Gwillim Law (2001-05-28), overriding Shanks & Pottenger:
 # <http://www.sumatera-inc.com/go_to_invest/about_indonesia.asp#standtime>
 # says that Indonesia's time zones
 changed on 1988-01-01. Looking at some
 # time zone maps, I think that must refer to Western Borneo (Kalimantan Barat
 # and Kalimantan Tengah) switching from UTC+8 to UTC+7.
 #
 # From Paul Eggert (2007-03-10):
 # Here is another correction to Shanks & Pottenger.
 # JohnTWB writes that Japanese forces did not surrender control in
 # Indonesia until 1945-09-01 00:00 at the earliest (in Jakarta) and
 # other formal surrender ceremonies were September 9, 11, and 13, plus
 # September 12 for the regional surrender to Mountbatten in Singapore.
 # These would be the earliest possible times for a change.
 # Regimes horaires pour le monde entier, by Henri Le Corre, (Editions
 # Traditionnelles, 1987, Paris) says that Java and Madura switched
 # from JST to UTC+07:30 on 1945-09-23, and gives 1944-09-01 for Jayapura
 # (Hollandia). For now, assume all Indonesian locations other than Jayapura
 # switched on 1945-09-23.
 #
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Asia/Jakarta 7:07:12 - LMT 1867 Aug 10
 #
 Shanks & Pottenger say the next transition was at 1924 Jan 1 0:13,
 # but this must be a typo.
 7:07:12 - JMT 1923 Dec 31 23:47:12 # Jakarta

7:20 - JAVT 1932 Nov # Java Time
7:30 - WIT 1942 Mar 23
9:00 - JST 1945 Sep 23
7:30 - WIT 1948 May
8:00 - WIT 1950 May
7:30 - WIT 1964
7:00 - WIT
Zone Asia/Pontianak 7:17:20 - LMT 1908 May
7:17:20 - PMT 1932 Nov # Pontianak MT
7:30 - WIT 1942 Jan 29
9:00 - JST 1945 Sep 23
7:30 - WIT 1948 May
8:00 - WIT 1950 May
7:30 - WIT 1964
8:00 - CIT 1988 Jan 1
7:00 - WIT
Zone Asia/Makassar 7:57:36 - LMT 1920
7:57:36 - MMT 1932 Nov # Macassar MT
8:00 - CIT 1942 Feb 9
9:00 - JST 1945 Sep 23
8:00 - CIT
Zone Asia/Jayapura 9:22:48 - LMT 1932 Nov
9:00 - EIT 1944 Sep 1
9:30 - CST 1964
9:00 - EIT

Iran

From Roozbeh Pournader (2003-03-15):
This is an English translation of what I just found (originally in Persian).
The Gregorian dates in brackets are mine:

Official Newspaper No.
13548-1370/6/25 [1991-09-16]
No. 16760/T233 H 1370/6/10 [1991-09-01]

The Rule About Change of the Official Time of the Country

The Board of Ministers, in the meeting dated 1370/5/23 [1991-08-14],
based on the suggestion number 2221/D dated 1370/4/22 [1991-07-13]
of the Country's Organization for Official and Employment Affairs,
and referring to the law for equating the working hours of workers
and officers in the whole country dated 1359/4/23 [1980-07-14], and
for synchronizing the official times of the country, agreed that:

The official time of the country will should move forward one hour
at the 24[:00] hours of the first day of Farvardin and should return
to its previous state at the 24[:00] hours of the 30th day of

Shahrivar.

First Deputy to the President - Hassan Habibi

From personal experience, that agrees with what has been followed
for at least the last 5 years. Before that, for a few years, the
date used was the first Thursday night
of Farvardin and the last
Thursday night of Shahrivar, but I can't give exact dates....
I have also changed the abbreviations to what is considered correct
here in Iran, IRST for regular time and IRDT for daylight saving time.

From Roozbeh Pournader (2005-04-05):
The text of the Iranian law, in effect since 1925, clearly mentions
that the true solar year is the measure, and there is no arithmetic
leap year calculation involved. There has never been any serious
plan to change that law....

From Paul Eggert (2006-03-22):
Go with Shanks & Pottenger before Sept. 1991, and with Pournader thereafter.
I used Ed Reingold's cal-persia in GNU Emacs 21.2 to check Persian dates,
stopping after 2037 when 32-bit time_t's overflow.
That cal-persia used Birashk's approximation, which disagrees with the solar
calendar predictions for the year 2025, so I corrected those dates by hand.

From Oscar van Vlijmen (2005-03-30), writing about future
discrepancies between
cal-persia and the Iranian calendar:
For 2091 solar-longitude-after yields 2091-03-20 08:40:07.7 UT for
the vernal equinox and that gets so close to 12:00 some local
Iranian time that the definition of the correct location needs to be
known exactly, amongst other factors. 2157 is even closer:
2157-03-20 08:37:15.5 UT. But the Gregorian year 2025 should give
no interpretation problem whatsoever. By the way, another instant
in the near future where there will be a discrepancy between
arithmetical and astronomical Iranian calendars will be in 2058:
vernal equinox on 2058-03-20 09:03:05.9 UT. The Java version of
Reingold's/Dershowitz' calculator gives correctly the Gregorian date
2058-03-21 for 1 Farvardin 1437 (astronomical).

From Steffen Thorsen (2006-03-22):
Several of my users have reported that Iran will not observe DST anymore:
<http://www.irna.ir/en/news/view/line-17/0603193812164948.htm>

From Reuters (2007-09-16), with a heads-up from Jesper Norgaard
Welen:
... the Guardian Council ... approved a law on Sunday to re-introduce
daylight saving time ...

<http://uk.reuters.com/article/oilRpt/idUKBLA65048420070916>

From Roozbeh Pournader (2007-11-05):
This is quoted from Official Gazette of the Islamic Republic of
Iran, Volume 63, Number 18242, dated Tuesday 1386/6/24
[2007-10-16]. I am doing the best translation I can:...
The official time of the country will be moved forward for one hour
on the 24 hours of the first day of the month of Farvardin and will
be changed back to its previous state on the 24 hours of the
thirtieth day of Shahrivar.

#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Iran 1978 1980 - Mar 21 0:00 1:00 D

Rule Iran 1978 only - Oct 21 0:00 0 S

Rule Iran 1979 only - Sep 19 0:00 0 S

Rule Iran 1980 only - Sep 23 0:00 0 S

Rule Iran 1991 only - May 3 0:00 1:00 D

Rule Iran 1992 1995 - Mar 22 0:00 1:00 D

Rule Iran 1991 1995 - Sep 22 0:00 0 S

Rule Iran 1996 only - Mar 21 0:00 1:00 D

Rule Iran 1996 only - Sep 21 0:00 0 S

Rule Iran 1997 1999 - Mar 22 0:00 1:00 D

Rule Iran 1997 1999 - Sep 22 0:00 0 S

Rule Iran 2000 only - Mar 21 0:00 1:00 D

Rule Iran 2000 only - Sep 21 0:00 0 S

Rule Iran 2001 2003 - Mar 22 0:00 1:00 D

Rule Iran 2001 2003 - Sep 22 0:00 0 S

Rule Iran 2004 only - Mar 21 0:00 1:00 D

Rule Iran 2004 only - Sep 21 0:00 0 S

Rule Iran 2005 only - Mar 22 0:00 1:00 D

Rule Iran 2005 only - Sep 22 0:00 0 S

Rule Iran 2008 only - Mar 21 0:00 1:00 D

Rule Iran 2008 only - Sep 21 0:00 0 S

Rule Iran 2009 2011 - Mar 22 0:00 1:00 D

Rule Iran 2009 2011 - Sep 22 0:00 0 S

Rule Iran 2012 only - Mar 21 0:00 1:00 D

Rule Iran 2012 only - Sep 21 0:00 0 S

Rule Iran 2013 2015 - Mar 22 0:00 1:00 D

Rule Iran 2013 2015 - Sep 22 0:00 0 S

Rule Iran 2016 only - Mar 21 0:00 1:00 D

Rule Iran 2016 only - Sep 21 0:00 0 S

Rule Iran 2017 2019 - Mar 22 0:00 1:00 D

Rule Iran 2017 2019 - Sep 22 0:00 0 S

Rule Iran 2020 only - Mar 21 0:00 1:00 D

Rule Iran 2020 only - Sep 21 0:00 0 S

Rule Iran 2021 2023 - Mar 22 0:00 1:00 D

Rule Iran 2021 2023 - Sep 22 0:00 0 S

Rule Iran 2024 only - Mar 21 0:00 1:00 D

Rule Iran 2024 only - Sep 21 0:00 0 S
Rule Iran 2025 2027 - Mar 22 0:00 1:00 D
Rule Iran 2025 2027 - Sep 22 0:00 0 S
Rule Iran 2028 2029 - Mar 21 0:00 1:00 D
Rule Iran 2028 2029 - Sep 21 0:00 0 S
Rule Iran 2030 2031 - Mar 22 0:00 1:00 D
Rule Iran 2030 2031 - Sep 22 0:00 0 S
Rule Iran 2032 2033 - Mar 21 0:00 1:00 D
Rule Iran 2032 2033 - Sep 21 0:00 0 S
Rule Iran 2034 2035 - Mar 22 0:00 1:00 D
Rule Iran 2034 2035 - Sep 22 0:00 0 S
Rule Iran 2036 2037 - Mar 21 0:00 1:00 D
Rule Iran 2036 2037 - Sep 21 0:00 0 S

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Tehran 3:25:44 - LMT 1916

3:25:44 - TMT 1946 # Tehran Mean Time

3:30 - IRST 1977 Nov

4:00 Iran IR%sT 1979

3:30 Iran IR%sT

Iraq

#

From Jonathan Lennox (2000-06-12):

An article in this week's Economist ("Inside the Saddam-free zone", p. 50 in
the U.S. edition) on the Iraqi Kurds contains a paragraph:

"The three northern
provinces ... switched their clocks this spring and
are an hour ahead of Baghdad."

#

But Rives McDow (2000-06-18) quotes a contact in Iraqi-Kurdistan as follows:

In the past, some Kurdish nationalists, as a protest to the Iraqi
Government, did not adhere to daylight saving time. They referred
to daylight saving as Saddam time. But, as of today, the time zone
in Iraqi-Kurdistan is on standard time with Baghdad, Iraq.

#

So we'll ignore the Economist's claim.

From Steffen Thorsen (2008-03-10):

The cabinet in Iraq abolished DST last week, according to the following
news sources (in Arabic):

http://www.aljeeran.net/wesima_articles/news-20080305-98602.html

<a

href="http://www.aswataliraq.info/look/article.tpl?id=2047&IdLanguage=17&IdPublication=4&NrArticle=71743&
NrIssue=1&NrSection=10">


```

#
http://www.aswataliraq.info/look/article.tpl?id=2047&IdLanguage=17&IdPublication=4&NrArticle=71743&NrIssue=1&NrSection=10
#
</a>
#
# We have published a short article in English about the change:
# <a href="http://www.timeanddate.com/news/time/iraq-dumps-daylight-saving.html">
# http://www.timeanddate.com/news/time/iraq-dumps-daylight-saving.html
# </a>

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Iraq 1982 only - May 1 0:00 1:00 D
Rule Iraq 1982 1984 - Oct 1 0:00 0 S
Rule Iraq 1983 only - Mar 31 0:00 1:00 D
Rule Iraq 1984 1985 - Apr 1 0:00 1:00 D
Rule Iraq 1985 1990 - Sep lastSun 1:00s 0 S
Rule Iraq 1986 1990 - Mar lastSun 1:00s 1:00 D
# IATA SSIM (1991/1996) says Apr 1 12:01am UTC; guess the `:01' is a typo.
# Shanks & Pottenger say Iraq did not observe DST 1992/1997; ignore this.
#
Rule Iraq 1991 2007 - Apr 1 3:00s 1:00 D
Rule Iraq 1991 2007 - Oct 1 3:00s 0 S
# Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Baghdad 2:57:40 - LMT 1890
2:57:36 - BMT 1918 # Baghdad Mean Time?
3:00 - AST 1982 May
3:00 Iraq A%sT

#####

#
Israel

# From Ephraim Silverberg (2001-01-11):
#
# I coined "IST/IDT" circa 1988. Until then there were three
# different abbreviations in use:
#
# JST Jerusalem Standard Time [Danny Braniss, Hebrew University]
# IZT Israel Zonal (sic) Time [Prof. Haim Papo, Technion]
# EEST Eastern Europe Standard Time [used by almost everyone else]
#
# Since timezones should be called by country and not capital cities,
# I ruled out JST. As Israel is in Asia Minor and not Eastern Europe,
# EEST was equally unacceptable. Since "zonal" was not compatible with
# any other timezone abbreviation, I felt that 'IST' was the way to go

```

and, indeed, it has received almost universal acceptance in timezone
settings in Israeli computers.

In any case, I am happy to share timezone abbreviations with India,
high on my favorite-country list (and not only because my wife's
family is from India).

From Shanks & Pottenger:

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Zion 1940 only - Jun

1 0:00 1:00 D

Rule Zion 1942 1944 - Nov 1 0:00 0 S

Rule Zion 1943 only - Apr 1 2:00 1:00 D

Rule Zion 1944 only - Apr 1 0:00 1:00 D

Rule Zion 1945 only - Apr 16 0:00 1:00 D

Rule Zion 1945 only - Nov 1 2:00 0 S

Rule Zion 1946 only - Apr 16 2:00 1:00 D

Rule Zion 1946 only - Nov 1 0:00 0 S

Rule Zion 1948 only - May 23 0:00 2:00 DD

Rule Zion 1948 only - Sep 1 0:00 1:00 D

Rule Zion 1948 1949 - Nov 1 2:00 0 S

Rule Zion 1949 only - May 1 0:00 1:00 D

Rule Zion 1950 only - Apr 16 0:00 1:00 D

Rule Zion 1950 only - Sep 15 3:00 0 S

Rule Zion 1951 only - Apr 1 0:00 1:00 D

Rule Zion 1951 only - Nov 11 3:00 0 S

Rule Zion 1952 only - Apr 20 2:00 1:00 D

Rule Zion 1952 only - Oct 19 3:00 0 S

Rule Zion 1953 only - Apr 12 2:00 1:00 D

Rule Zion 1953 only - Sep 13 3:00 0 S

Rule Zion 1954 only - Jun 13 0:00 1:00 D

Rule Zion 1954 only - Sep 12 0:00 0 S

Rule Zion 1955 only - Jun 11 2:00 1:00 D

Rule Zion 1955 only - Sep 11 0:00 0 S

Rule Zion 1956 only - Jun

3 0:00 1:00 D

Rule Zion 1956 only - Sep 30 3:00 0 S

Rule Zion 1957 only - Apr 29 2:00 1:00 D

Rule Zion 1957 only - Sep 22 0:00 0 S

Rule Zion 1974 only - Jul 7 0:00 1:00 D

Rule Zion 1974 only - Oct 13 0:00 0 S

Rule Zion 1975 only - Apr 20 0:00 1:00 D

Rule Zion 1975 only - Aug 31 0:00 0 S

Rule Zion 1985 only - Apr 14 0:00 1:00 D

Rule Zion 1985 only - Sep 15 0:00 0 S

Rule Zion 1986 only - May 18 0:00 1:00 D

Rule Zion 1986 only - Sep 7 0:00 0 S

Rule Zion 1987 only - Apr 15 0:00 1:00 D

Rule Zion 1987 only - Sep 13 0:00 0 S
Rule Zion 1988 only - Apr 9 0:00 1:00 D
Rule Zion 1988 only - Sep 3 0:00 0 S

From Ephraim Silverberg
(1997-03-04, 1998-03-16, 1998-12-28, 2000-01-17, 2000-07-25, 2004-12-22,
and 2005-02-17):

According to the Office of the Secretary General of the Ministry of
Interior, there is NO set rule for Daylight-Savings/Standard time changes.
One thing is entrenched in law, however: that there must be at least 150
days of daylight savings time annually. From 1993-1998,
the change to
daylight savings time was on a Friday morning from midnight IST to
1 a.m. IDT; up until 1998, the change back to standard time was on a
Saturday night from midnight daylight savings time to 11 p.m. standard
time. 1996 is an exception to this rule where the change back to standard
time took place on Sunday night instead of Saturday night to avoid
conflicts with the Jewish New Year. In 1999, the change to
daylight savings time was still on a Friday morning but from
2 a.m. IST to 3 a.m. IDT; furthermore, the change back to standard time
was also on a Friday morning from 2 a.m. IDT to 1 a.m. IST for
1999 only. In the year 2000, the change to daylight savings time was
similar to 1999, but although the change back will be on a Friday, it
will take place from 1 a.m. IDT to midnight IST. Starting in 2001, all
changes to/from will take place at 1 a.m. old time, but now there is no
rule as to what day of the week it will take place in as the
start date
(except in 2003) is the night after the Passover Seder (i.e. the eve
of the 16th of Nisan in the lunar Hebrew calendar) and the end date
(except in 2002) is three nights before Yom Kippur [Day of Atonement]
(the eve of the 7th of Tishrei in the lunar Hebrew calendar).

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Zion 1989 only - Apr 30 0:00 1:00 D
Rule Zion 1989 only - Sep 3 0:00 0 S
Rule Zion 1990 only - Mar 25 0:00 1:00 D
Rule Zion 1990 only - Aug 26 0:00 0 S
Rule Zion 1991 only - Mar 24 0:00 1:00 D
Rule Zion 1991 only - Sep 1 0:00 0 S
Rule Zion 1992 only - Mar 29 0:00 1:00 D
Rule Zion 1992 only - Sep 6 0:00 0 S
Rule Zion 1993 only - Apr 2 0:00 1:00 D
Rule Zion 1993 only - Sep 5 0:00 0 S

The dates for 1994-1995 were obtained from Office of the Spokeswoman for the
Ministry of Interior, Jerusalem, Israel. The spokeswoman can be reached by
calling the office directly at 972-2-6701447 or 972-2-6701448.

```
# Rule NAME FROM TO TYPE IN
  ON AT SAVE LETTER/S
Rule Zion 1994 only - Apr 1 0:00 1:00 D
Rule Zion 1994 only - Aug 28 0:00 0 S
Rule Zion 1995 only - Mar 31 0:00 1:00 D
Rule Zion 1995 only - Sep 3 0:00 0 S
```

```
# The dates for 1996 were determined by the Minister of Interior of the
# time, Haim Ramon. The official announcement regarding 1996-1998
# (with the dates for 1997-1998 no longer being relevant) can be viewed at:
#
# ftp://ftp.cs.huji.ac.il/pub/tz/announcements/1996-1998.ramon.ps.gz
#
# The dates for 1997-1998 were altered by his successor, Rabbi Eli Suissa.
#
# The official announcements for the years 1997-1999 can be viewed at:
#
# ftp://ftp.cs.huji.ac.il/pub/tz/announcements/YYYY.ps.gz
#
# where YYYY is the relevant year.
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Zion 1996 only - Mar 15 0:00 1:00 D
Rule Zion 1996 only - Sep 16 0:00 0 S
Rule Zion 1997 only - Mar 21 0:00 1:00 D
Rule Zion 1997 only - Sep 14 0:00 0 S
Rule Zion 1998 only - Mar 20 0:00 1:00 D
Rule Zion 1998 only - Sep
6 0:00 0 S
Rule Zion 1999 only - Apr 2 2:00 1:00 D
Rule Zion 1999 only - Sep 3 2:00 0 S
```

```
# The Knesset Interior Committee has changed the dates for 2000 for
# the third time in just over a year and have set new dates for the
# years 2001-2004 as well.
#
# The official announcement for the start date of 2000 can be viewed at:
#
# ftp://ftp.cs.huji.ac.il/pub/tz/announcements/2000-start.ps.gz
#
# The official announcement for the end date of 2000 and the dates
# for the years 2001-2004 can be viewed at:
#
# ftp://ftp.cs.huji.ac.il/pub/tz/announcements/2000-2004.ps.gz
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Zion 2000 only - Apr 14 2:00 1:00 D
```

Rule Zion 2000 only - Oct 6 1:00 0 S
Rule Zion 2001 only - Apr 9 1:00 1:00 D
Rule Zion 2001 only - Sep 24 1:00 0 S
Rule Zion 2002 only - Mar 29 1:00 1:00 D
Rule Zion 2002 only - Oct 7 1:00 0 S
Rule Zion 2003 only - Mar 28 1:00 1:00 D
Rule Zion 2003 only - Oct 3 1:00 0 S
Rule Zion 2004 only - Apr 7 1:00 1:00 D
Rule Zion 2004 only - Sep 22 1:00 0 S

#

The proposed law agreed upon by the Knesset Interior Committee on
2005-02-14 is that, for 2005 and beyond, DST starts at 02:00 the
last Friday before April 2nd (i.e. the last Friday in March or April
1st itself if it falls on a Friday) and ends at 02:00 on the Saturday
night _before_ the fast of Yom Kippur.

#

Those who can read Hebrew can view the announcement at:

#

<ftp://ftp.cs.huji.ac.il/pub/tz/announcements/2005+beyond.ps>

From Paul Eggert (2012-10-26):

I used Ephraim Silverberg's `dst-israel.el` program

<ftp://ftp.cs.huji.ac.il/pub/tz/software/dst-israel.el> (2005-02-20)

along with Ed Reingold's `cal-hebrew` in GNU Emacs 21.4,

to generate the transitions from 2005 through 2012.

(I replaced "lastFri" with "Fri>=26" by hand.)

The spring transitions all correspond to the following Rule:

#

Rule Zion 2005 2012 - Mar Fri>=26 2:00 1:00 D

#

but older `zic` implementations (e.g., Solaris 8) do not support

"Fri>=26" to mean April 1 in

years like 2005, so for now we list the

springtime transitions explicitly.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Zion 2005 only - Apr 1 2:00 1:00 D

Rule Zion 2005 only - Oct 9 2:00 0 S

Rule Zion 2006 2010 - Mar Fri>=26 2:00 1:00 D

Rule Zion 2006 only - Oct 1 2:00 0 S

Rule Zion 2007 only - Sep 16 2:00 0 S

Rule Zion 2008 only - Oct 5 2:00 0 S

Rule Zion 2009 only - Sep 27 2:00 0 S

Rule Zion 2010 only - Sep 12 2:00 0 S

Rule Zion 2011 only - Apr 1 2:00 1:00 D

Rule Zion 2011 only - Oct 2 2:00 0 S

Rule Zion 2012 only - Mar Fri>=26 2:00 1:00 D

Rule Zion 2012 only - Sep 23 2:00 0 S

From Ephraim Silverberg (2012-10-18):
Yesterday, the Interior Ministry Committee, after more than a year
past, approved sending the proposed June 2011 changes to the Time
Decree Law back to the Knesset for second and third (final) votes
before the upcoming elections on Jan. 22, 2013. Hence, although the
changes are not yet law, they are expected to be so before February 2013.

#

As of 2013, DST starts at 02:00 on the Friday before the last Sunday in March.
DST ends at 02:00 on the first Sunday after October 1, unless it occurs on the
second day of the Jewish Rosh Hashana holiday, in which case DST ends a day
later (i.e. at 02:00 the first Monday after October 2).
[Rosh Hashana holidays are factored in until 2100.]

From Ephraim Silverberg (2012-11-05):
The Knesset passed today (in second and final readings) the amendment to the
Time Decree Law making the changes ... law.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Zion 2013 max - Mar Fri>=23 2:00 1:00 D

Rule Zion 2013 2026 - Oct Sun>=2 2:00 0 S

Rule Zion 2027 only - Oct Mon>=3 2:00 0 S

Rule Zion 2028 max - Oct Sun>=2 2:00 0 S

The following rules are commented out for now, as they break older
versions of zic that support only signed 32-bit timestamps, i.e.,
through 2038-01-19 03:14:07 UTC.

#Rule Zion 2028 2053 - Oct Sun>=2 2:00 0 S

#Rule Zion 2054 only - Oct Mon>=3 2:00 0 S

#Rule Zion 2055 2080 - Oct Sun>=2 2:00 0 S

#Rule Zion 2081 only - Oct Mon>=3 2:00 0 S

#Rule Zion 2082 max - Oct Sun>=2 2:00 0 S

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Jerusalem 2:20:56 - LMT 1880

2:20:40 - JMT 1918 # Jerusalem Mean Time?

2:00 Zion I%sT

#####

Japan

`9:00' and `JST' is from Guy Harris.

From Paul Eggert (1995-03-06):
Today's _Asahi Evening News_ (page 4) reports that Japan had
daylight saving between 1948 and 1951, but ``the system was discontinued
because the public believed it would lead to longer working hours."

From Mayumi Negishi in the 2005-08-10 Japan Times
<<http://www.japantimes.co.jp/cgi-bin/getarticle.pl5?nn20050810f2.htm>>:
Occupation authorities imposed daylight-saving time on Japan on
[1948-05-01].... But lack of prior debate and the execution of
daylight-saving time just three days after the bill was passed generated
deep hatred of the concept....
The Diet unceremoniously passed a bill to
dump the unpopular system in October 1951, less than a month after the San
Francisco Peace Treaty was signed. (A government poll in 1951 showed 53%
of the Japanese wanted to scrap daylight-saving time, as opposed to 30% who
wanted to keep it.)

From Paul Eggert (2006-03-22):
Shanks & Pottenger write that DST in Japan during those years was as follows:
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Japan 1948 only - May Sun>=1 2:00 1:00 D
Rule Japan 1948 1951 - Sep Sat>=8 2:00 0 S
Rule Japan 1949 only - Apr Sun>=1 2:00 1:00 D
Rule Japan 1950 1951 - May Sun>=1 2:00 1:00 D
but the only locations using it (for birth certificates, presumably, since
their audience is astrologers) were US military bases. For now, assume
that for most purposes daylight-saving time was observed; otherwise, what
would have been the point of the 1951 poll?

From Hideyuki Suzuki (1998-11-09):
'Tokyo' usually stands for the former location
of Tokyo Astronomical
Observatory: E 139 44' 40".90 (9h 18m 58s.727), N 35 39' 16".0.
This data is from 'Rika Nenpyou (Chronological Scientific Tables) 1996'
edited by National Astronomical Observatory of Japan....
JST (Japan Standard Time) has been used since 1888-01-01 00:00 (JST).
The law is enacted on 1886-07-07.

From Hideyuki Suzuki (1998-11-16):
The ordinance No. 51 (1886) established "standard time" in Japan,
which stands for the time on E 135 degree.
In the ordinance No. 167 (1895), "standard time" was renamed to "central
standard time". And the same ordinance also established "western standard
time", which stands for the time on E 120 degree.... But "western standard
time" was abolished in the ordinance No. 529 (1937). In the ordinance No.
167, there is no mention regarding for what place western standard time is
standard....
#

I wrote "ordinance" above, but I don't know how to translate.
In Japanese it's "chokurei", which means ordinance
from emperor.

Shanks & Pottenger claim JST in use since 1896, and that a few
places (e.g. Ishigaki) use +0800; go with Suzuki. Guess that all
ordinances took effect on Jan 1.

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Tokyo 9:18:59 - LMT 1887 Dec 31 15:00u
9:00 - JST 1896
9:00 - CJT 1938
9:00 Japan J%ST

Since 1938, all Japanese possessions have been like Asia/Tokyo.

Jordan

From <http://star.arabia.com/990701/JO9.html>
Jordan Week (1999-07-01) via Steffen Thorsen (1999-09-09):
Clocks in Jordan were forwarded one hour on Wednesday at midnight,
in accordance with the government's decision to implement summer time
all year round.

From <http://star.arabia.com/990930/JO9.html>
Jordan Week (1999-09-30) via Steffen Thorsen (1999-11-09):
Winter time starts today Thursday, 30 September. Clocks will be turned back
by one hour. This is the latest government decision and it's final!
The decision was taken because
of the increase in working hours in
government's departments from six to seven hours.

From Paul Eggert (2005-11-22):
Starting 2003 transitions are from Steffen Thorsen's web site timeanddate.com.

From Steffen Thorsen (2005-11-23):
For Jordan I have received multiple independent user reports every year
about DST end dates, as the end-rule is different every year.

From Steffen Thorsen (2006-10-01), after a heads-up from Hilal Malawi:
<http://www.petranews.gov.jo/nepras/2006/Sep/05/4000.htm>
"Jordan will switch to winter time on Friday, October 27".

From Phil Pizzey (2009-04-02):
...I think I may have spotted an error in the timezone data for
Jordan.
The current (2009d) asia file shows Jordan going to daylight
saving


```

# time on the last Thursday in March.
#
# Rule Jordan 2000 max - Mar lastThu 0:00s 1:00 S
#
# However timeanddate.com, which I usually find reliable, shows Jordan
# going to daylight saving time on the last Friday in March
# since 2002.
# Please see
# <a href="http://www.timeanddate.com/worldclock/timezone.html?n=11">
# http://www.timeanddate.com/worldclock/timezone.html?n=11
# </a>

# From Steffen Thorsen (2009-04-02):
# This single one might be good enough, (2009-03-24, Arabic):
# <a href="http://petra.gov.jo/Artical.aspx?Lng=2&Section=8&Artical=95279">
# http://petra.gov.jo/Artical.aspx?Lng=2&Section=8&Artical=95279
# </a>
#
# Google's translation:
#
# > The Council of Ministers decided in 2002 to adopt the principle of timely
# > submission of the summer at 60 minutes as of midnight on the last Thursday
# > of the month of March of each year.
#
# So - this means the midnight between Thursday and Friday since 2002.

# From Arthur David Olson (2009-04-06):
# We still have Jordan switching to DST on Thursdays in 2000 and 2001.

# From Steffen Thorsen (2012-10-25):
# Yesterday the government in Jordan announced that they will not
# switch back to standard time this winter, so they will stay on DST
# until
# about the same time next year (at least).
# http://www.petra.gov.jo/Public_News/Nws_NewsDetails.aspx?NewsID=88950
#
# From Paul Eggert (2012-10-25):
# For now, assume this is just a one-year measure. If it becomes
# permanent, we should move Jordan from EET to AST effective tomorrow.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Jordan 1973 only - Jun 6 0:00 1:00 S
Rule Jordan 1973 1975 - Oct 1 0:00 0 -
Rule Jordan 1974 1977 - May 1 0:00 1:00 S
Rule Jordan 1976 only - Nov 1 0:00 0 -
Rule Jordan 1977 only - Oct 1 0:00 0 -
Rule Jordan 1978 only - Apr 30 0:00 1:00 S
Rule Jordan 1978 only - Sep 30 0:00 0 -

```

Rule Jordan 1985 only - Apr 1 0:00 1:00 S
Rule Jordan 1985 only - Oct 1 0:00 0 -
Rule Jordan 1986 1988 - Apr Fri>=1 0:00 1:00 S
Rule Jordan 1986 1990 - Oct Fri>=1 0:00 0 -
Rule Jordan 1989 only - May 8 0:00 1:00 S
Rule Jordan 1990 only - Apr 27 0:00 1:00 S
Rule Jordan 1991 only - Apr 17 0:00 1:00 S
Rule Jordan 1991 only - Sep 27 0:00 0 -
Rule Jordan 1992 only - Apr 10 0:00 1:00 S
Rule Jordan 1992 1993 - Oct Fri>=1 0:00 0 -
Rule Jordan 1993 1998 - Apr Fri>=1 0:00 1:00 S
Rule Jordan 1994 only - Sep Fri>=15 0:00 0 -
Rule Jordan 1995 1998 - Sep Fri>=15 0:00s 0 -
Rule Jordan 1999 only - Jul
1 0:00s 1:00 S
Rule Jordan 1999 2002 - Sep lastFri 0:00s 0 -
Rule Jordan 2000 2001 - Mar lastThu 0:00s 1:00 S
Rule Jordan 2002 max - Mar lastThu 24:00 1:00 S
Rule Jordan 2003 only - Oct 24 0:00s 0 -
Rule Jordan 2004 only - Oct 15 0:00s 0 -
Rule Jordan 2005 only - Sep lastFri 0:00s 0 -
Rule Jordan 2006 2011 - Oct lastFri 0:00s 0 -
Rule Jordan 2013 max - Oct lastFri 0:00s 0 -
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Amman 2:23:44 - LMT 1931
2:00 Jordan EE%sT

Kazakhstan

From Paul Eggert (1996-11-22):
Andrew Evtichov (1996-04-13) writes that Kazakhstan
stayed in sync with Moscow after 1990, and that Aqtobe (formerly Aktyubinsk)
and Aqtau (formerly Shevchenko) are the largest cities in their zones.
Guess that Aqtau and Aqtobe diverged in 1995, since that's
the first time
IATA SSIM mentions a third time zone in Kazakhstan.

From Paul Eggert (2006-03-22):
German Iofis, ELSI, Almaty (2001-10-09) reports that Kazakhstan uses
RussiaAsia rules, instead of switching at 00:00 as the IATA has it.
Go with Shanks & Pottenger, who have them always using RussiaAsia rules.
Also go with the following claims of Shanks & Pottenger:

- Kazakhstan did not observe DST in 1991.
- Qyzylorda switched from +5:00 to +6:00 on 1992-01-19 02:00.
- Oral switched from +5:00 to +4:00 in spring 1989.

From Kazakhstan Embassy's News Bulletin #11 (2005-03-21):

The Government of Kazakhstan passed a resolution March 15 abolishing
daylight saving time citing lack of economic benefits and health
complications coupled with a decrease in productivity.

From Branislav Kojic (in Astana) via Gwillim Law (2005-06-28):
... what happened was that the former Kazakhstan Eastern time
zone
was "blended" with the Central zone. Therefore, Kazakhstan now has
two time zones, and difference between them is one hour. The zone
closer to UTC is the former Western zone (probably still called the
same), encompassing four provinces in the west: Aqtobe, Atyrau,
Mangghystau, and West Kazakhstan. The other zone encompasses
everything else.... I guess that would make Kazakhstan time zones
de jure UTC+5 and UTC+6 respectively.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Almaty (formerly Alma-Ata), representing most locations in Kazakhstan
Zone Asia/Almaty 5:07:48 - LMT 1924 May 2 # or Alma-Ata
5:00 - ALMT 1930 Jun 21 # Alma-Ata Time
6:00 RussiaAsia ALM%ST 1991
6:00 - ALMT 1992
6:00 RussiaAsia ALM%ST 2005 Mar 15
6:00 - ALMT
Qyzylorda (aka Kyzylorda, Kizilorda, Kzyl-Orda, etc.)
Zone Asia/Qyzylorda 4:21:52 - LMT 1924 May 2
4:00 - KIZT 1930 Jun 21 # Kizilorda Time
5:00 - KIZT 1981 Apr 1
5:00 1:00 KIZST 1981 Oct 1
6:00 - KIZT 1982
Apr 1
5:00 RussiaAsia KIZ%ST 1991
5:00 - KIZT 1991 Dec 16 # independence
5:00 - QYZT 1992 Jan 19 2:00
6:00 RussiaAsia QYZ%ST 2005 Mar 15
6:00 - QYZT
Aqtobe (aka Aktobe, formerly Akt'ubinsk)
Zone Asia/Aqtobe 3:48:40 - LMT 1924 May 2
4:00 - AKTT 1930 Jun 21 # Aktyubinsk Time
5:00 - AKTT 1981 Apr 1
5:00 1:00 AKTST 1981 Oct 1
6:00 - AKTT 1982 Apr 1
5:00 RussiaAsia AKT%ST 1991
5:00 - AKTT 1991 Dec 16 # independence

5:00 RussiaAsia AQT%sT 2005 Mar 15 # Aqtobe Time
 5:00 - AQTT
 # Mangghystau
 # Aqtau was not founded until 1963, but it represents an inhabited region,
 # so include time stamps before 1963.
 Zone Asia/Aqtau 3:21:04 - LMT 1924 May 2
 4:00 - FORT 1930 Jun 21 # Fort Shevchenko T
 5:00 - FORT 1963
 5:00 - SHET 1981 Oct 1 # Shevchenko Time
 6:00 - SHET 1982 Apr 1
 5:00 RussiaAsia SHE%sT 1991
 5:00 - SHET 1991 Dec 16 # independence
 5:00 RussiaAsia AQT%sT 1995 Mar lastSun 2:00 # Aqtau Time
 4:00 RussiaAsia AQT%sT 2005 Mar 15
 5:00 - AQTT
 #
 West Kazakhstan
 Zone Asia/Oral 3:25:24 - LMT 1924 May 2 # or Ural'sk
 4:00 - URAT 1930 Jun 21 # Ural'sk time
 5:00 - URAT 1981 Apr 1
 5:00 1:00 URAST 1981 Oct 1
 6:00 - URAT 1982 Apr 1
 5:00 RussiaAsia URA%sT 1989 Mar 26 2:00
 4:00 RussiaAsia URA%sT 1991
 4:00 - URAT 1991 Dec 16 # independence
 4:00 RussiaAsia ORA%sT 2005 Mar 15 # Oral Time
 5:00 - ORAT

 # Kyrgyzstan (Kirgizstan)
 # Transitions through 1991 are from Shanks & Pottenger.

 # From Paul Eggert (2005-08-15):
 # According to an article dated today in the Kyrgyzstan Development Gateway
 # <http://eng.gateway.kg/cgi-bin/page.pl?id=1&story_name=doc9979.shtml>
 # Kyrgyzstan is canceling the daylight saving time system. I take the article
 # to mean that they will leave their clocks at 6 hours ahead of UTC.
 # From Malik Abdugaliyev (2005-09-21):
 # Our government cancels daylight saving time 6th of August 2005.
 # From 2005-08-12 our GMT-offset is +6, w/o any daylight saving.

 # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
 Rule Kyrgyz 1992 1996 - Apr Sun>=7 0:00s 1:00 S
 Rule Kyrgyz 1992 1996 - Sep lastSun 0:00 0 -
 Rule Kyrgyz 1997 2005 - Mar lastSun 2:30 1:00 S
 Rule Kyrgyz 1997 2004 - Oct lastSun 2:30 0 -
 #
 Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Asia/Bishkek 4:58:24 - LMT 1924 May 2

5:00 - FRUT 1930 Jun 21 # Frunze Time
6:00 RussiaAsia FRU%ST 1991 Mar 31 2:00s
5:00 1:00 FRUST 1991 Aug 31 2:00 # independence
5:00 Kyrgyz KG%ST 2005 Aug 12 # Kyrgyzstan Time
6:00 - KGT

#####

Korea (North and South)

From Annie I. Bang (2006-07-10) in
<http://www.koreaherald.co.kr/SITE/data/html_dir/2006/07/10/200607100012.asp>:
The Ministry of Commerce, Industry and Energy has already
commissioned a research project [to reintroduce DST] and has said
the system may begin as early as 2008.... Korea ran a daylight
saving program from 1949-61 but stopped it during the 1950-53 Korean War.

#

From Shanks & Pottenger:
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule ROK 1960 only - May 15 0:00 1:00 D
Rule ROK 1960 only - Sep 13 0:00 0 S
Rule ROK 1987 1988 - May Sun>=8 0:00 1:00 D
Rule ROK 1987 1988 - Oct Sun>=8 0:00 0 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Seoul 8:27:52 - LMT 1890
8:30 - KST 1904 Dec
9:00 - KST 1928
8:30 - KST 1932
9:00 - KST 1954 Mar 21
8:00 ROK K%ST 1961 Aug 10
8:30 - KST 1968 Oct
9:00 ROK K%ST
Zone Asia/Pyongyang 8:23:00 - LMT 1890
8:30 - KST 1904 Dec
9:00 - KST 1928
8:30 - KST 1932
9:00 - KST 1954 Mar 21
8:00 - KST 1961 Aug 10
9:00 - KST

#####

Kuwait

Zone NAME GMTOFF RULES FORMAT [UNTIL]
From the Arab Times (2007-03-14):
The Civil Service Commission (CSC) has approved a proposal forwarded

by MP Ahmad Baqer on implementing the daylight saving time (DST) in
Kuwait starting from April until the end of Sept this
year, reports Al-Anba.
<<http://www.arabtimesonline.com/arabtimes/kuwait/Viewdet.asp?ID=9950>>.
From Paul Eggert (2007-03-29):
We don't know the details, or whether the approval means it'll happen,
so for now we assume no DST.
Zone Asia/Kuwait 3:11:56 - LMT 1950
3:00 - AST

Laos
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Vientiane 6:50:24 - LMT 1906 Jun 9 # or Viangchan
7:06:20 - SMT 1911 Mar 11 0:01 # Saigon MT?
7:00 - ICT 1912 May
8:00 - ICT 1931 May
7:00 - ICT

Lebanon
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Lebanon 1920 only - Mar 28 0:00 1:00 S
Rule Lebanon 1920 only - Oct 25 0:00 0 -
Rule Lebanon 1921 only - Apr 3 0:00 1:00 S
Rule Lebanon 1921 only - Oct 3 0:00 0 -
Rule Lebanon 1922 only - Mar 26 0:00 1:00 S
Rule Lebanon 1922 only - Oct 8 0:00 0 -
Rule Lebanon 1923 only - Apr 22 0:00 1:00 S
Rule Lebanon 1923 only - Sep 16 0:00 0 -
Rule Lebanon 1957 1961 - May 1 0:00 1:00 S
Rule Lebanon 1957 1961 - Oct 1 0:00 0 -
Rule Lebanon 1972 only - Jun 22 0:00 1:00 S
Rule Lebanon 1972 1977 - Oct 1 0:00 0 -
Rule Lebanon 1973 1977 - May 1 0:00 1:00 S
Rule Lebanon 1978 only - Apr 30 0:00 1:00 S
Rule Lebanon 1978 only - Sep 30 0:00 0 -
Rule Lebanon 1984 1987 - May 1 0:00 1:00 S
Rule Lebanon 1984 1991 - Oct 16 0:00 0 -
Rule Lebanon 1988 only - Jun 1 0:00 1:00 S
Rule Lebanon 1989 only - May 10 0:00 1:00 S
Rule Lebanon 1990 1992 - May 1 0:00 1:00 S
Rule Lebanon 1992 only - Oct 4 0:00 0 -
Rule Lebanon 1993 max - Mar lastSun 0:00 1:00 S
Rule Lebanon 1993 1998 - Sep lastSun 0:00 0 -
Rule Lebanon 1999 max - Oct lastSun 0:00 0 -

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Beirut 2:22:00 - LMT 1880
2:00 Lebanon EE%sT

```

# Malaysia
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule NBorneo 1935 1941 - Sep 14 0:00 0:20 TS # one-Third Summer
Rule NBorneo 1935 1941 - Dec 14 0:00 0 -
#
# peninsular Malaysia
# The data here are taken from Mok Ly Yng (2003-10-30)
# <http://www.math.nus.edu.sg/aslaksen/teaching/timezone.html>.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone
Asia/Kuala_Lumpur 6:46:46 - LMT 1901 Jan 1
6:55:25 - SMT 1905 Jun 1 # Singapore M.T.
7:00 - MALT 1933 Jan 1 # Malaya Time
7:00 0:20 MALST 1936 Jan 1
7:20 - MALT 1941 Sep 1
7:30 - MALT 1942 Feb 16
9:00 - JST 1945 Sep 12
7:30 - MALT 1982 Jan 1
8:00 - MYT # Malaysia Time
# Sabah & Sarawak
# From Paul Eggert (2006-03-22):
# The data here are mostly from Shanks & Pottenger, but the 1942, 1945 and 1982
# transition dates are from Mok Ly Yng.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Kuching 7:21:20 - LMT 1926 Mar
7:30 - BORT 1933 # Borneo Time
8:00 NBorneo BOR%sT 1942 Feb 16
9:00 - JST 1945 Sep 12
8:00 - BORT 1982 Jan 1
8:00 - MYT

# Maldives
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Indian/Maldives 4:54:00 - LMT 1880 # Male
4:54:00 - MMT 1960 # Male Mean Time
5:00 - MVT # Maldives Time

# Mongolia

# Shanks & Pottenger say that Mongolia has three time zones, but
# usno1995 and the CIA map
Standard Time Zones of the World (2005-03)
# both say that it has just one.

# From Oscar van Vlijmen (1999-12-11):
# <http://www.mongoliatourism.gov.mn/general.htm>
# General Information Mongolia

```

 (1999-09)

"Time: Mongolia has two time zones. Three westernmost provinces of
Bayan-Ulgii, Uvs, and Hovd are one hour earlier than the capital city, and
the rest of the country follows the Ulaanbaatar time, which is UTC/GMT plus
eight hours."

From Rives McDow (1999-12-13):

Mongolia discontinued the use of daylight savings time in 1999; 1998
being the last year it was implemented. The dates of implementation I am
unsure of, but most probably it was similar to Russia, except for the time
of implementation may have been different...
Some maps in the past have indicated that there was an additional time
zone in the eastern part of Mongolia, including the provinces of Dornod,
Suhbaatar, and possibly Khentij.

From Paul Eggert (1999-12-15):

Naming and
spelling is tricky in Mongolia.
We'll use Hovd (also spelled Chovd and Khovd) to represent the west zone;
the capital of the Hovd province is sometimes called Hovd, sometimes Dund-U, and
sometimes Jirgalanta (with variant spellings), but the name Hovd
is good enough for our purposes.

From Rives McDow (2001-05-13):

In addition to Mongolia starting daylight savings as reported earlier
(adopted DST on 2001-04-27 02:00 local time, ending 2001-09-28),
there are three time zones.

#

Provinces [at 7:00]: Bayan-ulgii, Uvs, Khovd, Zavkhan, Govi-Altai
Provinces [at 8:00]: Khovsgol, Bulgan, Arkhangai, Khentii, Tov,
Bayankhongor, Ovorkhangai, Dundgovi, Dornogovi, Omnogovi
Provinces [at 9:00]: Dornod, Sukhbaatar

#

[The province of Selenge is omitted from the above lists.]

From Ganbold Ts., Ulaanbaatar (2004-04-17):

Daylight saving occurs at 02:00 local time last Saturday of March.
It will change back to normal at 02:00 local time last Saturday of
September.... As

I remember this rule was changed in 2001.

#

From Paul Eggert (2004-04-17):

For now, assume Rives McDow's informant got confused about Friday vs
Saturday, and that his 2001 dates should have 1 added to them.

From Paul Eggert (2005-07-26):

We have wildly conflicting information about Mongolia's time zones.
Bill Bonnet (2005-05-19) reports that the US Embassy in Ulaanbaatar says

there is only one time zone and that DST is observed, citing Microsoft
Windows XP as the source. Risto Nykanen (2005-05-16) reports that
travelmongolia.org says there are two time zones (UTC+7, UTC+8) with no DST.
Oscar van Vlijmen (2005-05-20) reports that the Mongolian Embassy in
Washington, DC says there are two time zones, with DST observed.
He also found

<http://ubpost.mongolnews.mn/index.php?subaction=showcomments&id=1111634894&archive=&start_from=&ucat=1&>
which also says that there is DST, and which has a comment by "Toddus"
(2005-03-31 06:05 +0700) saying "Mongolia actually
has 3.5 time zones.
The West (OLGII) is +7 GMT, most of the country is ULAT is +8 GMT
and some Eastern provinces are +9 GMT but Sukhbaatar Aimag is SUHK +8.5 GMT.
The SUKH timezone is new this year, it is one of the few things the
parliament passed during the tumultuous winter session."
For now, let's ignore this information, until we have more confirmation.

From Ganbold Ts. (2007-02-26):
Parliament of Mongolia has just changed the daylight-saving rule in February.
They decided not to adopt daylight-saving time....
<http://www.mongolnews.mn/index.php?module=unuudur&sec=view&id=15742>

From Deborah Goldsmith (2008-03-30):
We received a bug report claiming that the tz database UTC offset for
Asia/Choibalsan (GMT+09:00) is incorrect, and that it should be GMT
+08:00 instead. Different sources appear to disagree with the tz
database on this, e.g.:

<<http://www.timeanddate.com/worldclock/city.html?n=1026>>
<http://www.timeanddate.com/worldclock/city.html?n=1026>

<http://www.worldtimeserver.com/current_time_in_MN.aspx>
http://www.worldtimeserver.com/current_time_in_MN.aspx

both say GMT+08:00.

From Steffen Thorsen (2008-03-31):
eznis airways, which operates several domestic flights, has a flight
schedule here:
<<http://www.eznis.com/Container.jsp?id=112>>
<http://www.eznis.com/Container.jsp?id=112>

(click the English flag for English)

There it appears that flights between Choibalsan and Ulaanbatar arrive

about 1:35 - 1:50 hours later in local clock time, no matter the
direction, while Ulaanbaatar-Khvod takes 2 hours in the Eastern
direction and 3:35 back, which indicates that Ulaanbatar and Khvod are
in different time zones (like we know about), while Choibalsan and
Ulaanbatar are in the same time zone (correction needed).

From Arthur David Olson (2008-05-19):
Assume that Choibalsan is indeed offset by 8:00.
XXX--in the absence of better information, assume
that transition
was at the start of 2008-03-31 (the day of Steffen Thorsen's report);
this is almost surely wrong.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Mongol 1983 1984 - Apr 1 0:00 1:00 S
Rule Mongol 1983 only - Oct 1 0:00 0 -
Shanks & Pottenger and IATA SSIM say 1990s switches occurred at 00:00,
but McDow says the 2001 switches occurred at 02:00. Also, IATA SSIM
(1996-09) says 1996-10-25. Go with Shanks & Pottenger through 1998.

Shanks & Pottenger say that the Sept. 1984 through Sept. 1990 switches
in Choibalsan (more precisely, in Dornod and Sukhbaatar) took place
at 02:00 standard time, not at 00:00 local time as in the rest of
the country. That would be odd, and possibly is a result of their
correction of 02:00 (in the previous edition) not being done correctly
in the latest edition; so ignore it for now.

Rule Mongol 1985 1998 - Mar lastSun 0:00 1:00 S
Rule Mongol 1984 1998 - Sep lastSun 0:00 0 -
IATA SSIM (1999-09) says Mongolia no
longer observes DST.
Rule Mongol 2001 only - Apr lastSat 2:00 1:00 S
Rule Mongol 2001 2006 - Sep lastSat 2:00 0 -
Rule Mongol 2002 2006 - Mar lastSat 2:00 1:00 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Hovd, a.k.a. Chovd, Dund-Uus, Dzhargalant, Khovd, Jirgalanta
Zone Asia/Hovd 6:06:36 - LMT 1905 Aug
6:00 - HOVT 1978 # Hovd Time
7:00 Mongol HOV%ST
Ulaanbaatar, a.k.a. Ulan Bataar, Ulan Bator, Uрга
Zone Asia/Ulaanbaatar 7:07:32 - LMT 1905 Aug
7:00 - ULAT 1978 # Ulaanbaatar Time
8:00 Mongol ULA%ST
Choibalsan, a.k.a. Bajan Tuemen, Bajan Tumen, Chojbalsan,
Choybalsan, Sanbejse, Tchoibalsan
Zone Asia/Choibalsan 7:38:00 - LMT 1905 Aug
7:00 - ULAT 1978

8:00 - ULAT 1983 Apr
9:00 Mongol CHO%ST 2008 Mar 31 # Choibalsan Time
8:00 Mongol CHO%ST

Nepal
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Kathmandu 5:41:16 - LMT 1920
5:30 - IST 1986
5:45 - NPT # Nepal Time

Oman

Milne says 3:54:24 was the meridian of the Muscat Tidal Observatory.

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Muscat 3:54:24
- LMT 1920
4:00 - GST

Pakistan

From Rives McDow (2002-03-13):
I have been advised that Pakistan has decided to adopt dst on a
TRIAL basis for one year, starting 00:01 local time on April 7, 2002
and ending at 00:01 local time October 6, 2002. This is what I was
told, but I believe that the actual time of change may be 00:00; the
00:01 was to make it clear which day it was on.

From Paul Eggert (2002-03-15):
Jesper Norgaard found this URL:
http://www.pak.gov.pk/public/news/app/app06_dec.htm
(dated 2001-12-06) which says that the Cabinet adopted a scheme "to
advance the clocks by one hour on the night between the first
Saturday and Sunday of April and revert to the original position on
15th October each year". This agrees with McDow's 04-07 at 00:00,
but disagrees about the October transition, and makes it sound like
it's not on a trial basis. Also, the "between the first Saturday
and Sunday
of April" phrase, if taken literally, means that the
transition takes place at 00:00 on the first Sunday on or after 04-02.

From Paul Eggert (2003-02-09):
DAWN <<http://www.dawn.com/2002/10/06/top13.htm>> reported on 2002-10-05
that 2002 DST ended that day at midnight. Go with McDow for now.

From Steffen Thorsen (2003-03-14):
According to <http://www.dawn.com/2003/03/07/top15.htm>
there will be no DST in Pakistan this year:

ISLAMABAD, March 6: Information and Media Development Minister Sheikh
Rashid Ahmed on Thursday said the cabinet had reversed a previous
decision to advance clocks by one hour in summer and put them back by
one hour in winter with the aim of saving light hours and energy.

The minister told a news conference that the experiment had rather
shown 8 per cent higher consumption of electricity.

From Alex Krivenyshev (2008-05-15):

Here is an article that Pakistan plan to introduce Daylight Saving Time
on June 1, 2008 for 3 months.

"... The federal cabinet on Wednesday announced a new conservation plan to help
reduce load shedding by approving the closure of commercial centres at 9pm and
moving clocks forward by one hour for the next three months.
...."

http://www.worldtimezone.net/dst_news/dst_news_pakistan01.html

OR

http://www.dailytimes.com.pk/default.asp?page=2008%5C05%5C15%5Cstory_15-5-2008_pg1_4

From Arthur David Olson (2008-05-19):
XXX--midnight transitions is a guess; 2008 only is a guess.

From Alexander Krivenyshev (2008-08-28):
Pakistan government has decided to keep the watches one-hour advanced
for another 2 months--plan to return to Standard Time on October 31
instead of August 31.

http://www.worldtimezone.com/dst_news/dst_news_pakistan02.html

OR

http://dailymailnews.com/200808/28/news/dmbrn03.html

From Alexander Krivenyshev (2009-04-08):
Based on previous media reports that "... proposed plan to
advance clocks by one hour from May 1 will cause disturbance

to the working schedules rather than bringing discipline in
official working."

http://www.thenews.com.pk/daily_detail.asp?id=171280

recent news that instead of May 2009 - Pakistan plan to
introduce DST from April 15, 2009

FYI: Associated Press Of Pakistan
April 08, 2009
Cabinet okays proposal to advance clocks by one hour from April 15

http://www.app.com.pk/en_/index.php?option=com_content&task=view&id=73043&Itemid=1

or

http://www.worldtimezone.com/dst_news/dst_news_pakistan05.html

....
The Federal Cabinet on Wednesday approved the proposal to
advance clocks in the country by one hour from April 15 to
conserve energy"

From Steffen Thorsen (2009-09-17):
"The News International," Pakistan reports that: "The Federal
Government has decided to restore the previous time by moving the
clocks backward by one hour from October 1. A formal announcement to
this effect will be made after the Prime Minister grants approval in
this regard."

http://www.thenews.com.pk/updates.asp?id=87168

From Alexander Krivenyshev (2009-09-28):
According to Associated Press Of Pakistan, it is confirmed that
Pakistan clocks across the country would be turned back by an hour from October
1, 2009.

"Clocks to go back one hour from 1 Oct"

http://www.app.com.pk/en_/index.php?option=com_content&task=view&id=86715&Itemid=2

or

http://www.worldtimezone.com/dst_news/dst_news_pakistan07.htm

From Steffen Thorsen (2009-09-29):
Alexander Krivenyshev wrote:
> According to Associated Press Of Pakistan, it is confirmed that
> Pakistan clocks across the country would be turned back by an hour from October
> 1, 2009.

Now they seem to have changed their mind, November 1 is the new date:

http://www.thenews.com.pk/top_story_detail.asp?Id=24742

"The country's clocks will be reversed by one hour on November 1.
Officials of Federal Ministry for Interior told this to Geo News on
Monday."

And more importantly, it seems that these dates will be kept every year:
"It has now been decided that clocks
will be wound forward by one hour
on April 15 and reversed by an hour on November 1 every year without
obtaining prior approval, the officials added."

We have confirmed this year's end date with both with the Ministry of
Water and Power and the Pakistan Electric Power Company:

http://www.timeanddate.com/news/time/pakistan-ends-dst09.html

From Christoph Goehre (2009-10-01):
[T]he German Consulate General in Karachi reported me today that Pakistan
will go back to standard time on 1st of November.

From Steffen Thorsen (2010-03-26):
Steffen Thorsen wrote:
> On Thursday (2010-03-25) it was announced that DST would start in
> Pakistan on 2010-04-01.
>
> Then today, the president said that they might have to revert the
> decision if it is not supported by the parliament. So at the time
> being, it seems unclear if DST will be actually observed or not - but
> April 1 could
be a more likely date than April 15.
Now, it seems that the decision to not observe DST in final:

"Govt Withdraws Plan To Advance Clocks"

```
# <a href="http://www.apakistannews.com/govt-withdraws-plan-to-advance-clocks-172041">
# http://www.apakistannews.com/govt-withdraws-plan-to-advance-clocks-172041
# </a>
#
# "People laud PM's announcement to end DST"
# <a href="http://www.app.com.pk/en_/index.php?option=com_content&task=view&id=99374&Itemid=2">
# http://www.app.com.pk/en_/index.php?option=com_content&task=view&id=99374&Itemid=2
# </a>
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
```

```
Rule Pakistan 2002 only - Apr Sun>=2 0:01 1:00 S
```

```
Rule Pakistan 2002 only - Oct Sun>=2 0:01 0 -
```

```
Rule Pakistan 2008 only - Jun 1 0:00 1:00 S
```

```
Rule Pakistan 2008 only - Nov 1 0:00 0 -
```

```
Rule Pakistan 2009 only - Apr 15 0:00 1:00 S
```

```
Rule Pakistan 2009 only - Nov 1 0:00 0 -
```

```
# Zone NAME GMTTOFF RULES FORMAT [UNTIL]
```

```
Zone Asia/Karachi 4:28:12 - LMT 1907
```

```
5:30 - IST 1942 Sep
```

```
5:30 1:00 IST 1945 Oct 15
```

```
5:30 - IST 1951
```

```
Sep 30
```

```
5:00 - KART 1971 Mar 26 # Karachi Time
```

```
5:00 Pakistan PK%sT # Pakistan Time
```

```
# Palestine
```

```
# From Amos Shapir (1998-02-15):
```

```
#
```

```
# From 1917 until 1948-05-15, all of Palestine, including the parts now
```

```
# known as the Gaza Strip and the West Bank, was under British rule.
```

```
# Therefore the rules given for Israel for that period, apply there too...
```

```
#
```

```
# The Gaza Strip was under Egyptian rule between 1948-05-15 until 1967-06-05
```

```
# (except a short occupation by Israel from 1956-11 till 1957-03, but no
```

```
# time zone was affected then). It was never formally annexed to Egypt,
```

```
# though.
```

```
#
```

```
# The rest of Palestine was under Jordanian rule at that time, formally
```

```
# annexed in 1950 as the West Bank (and the word "Trans" was dropped from
```

```
# the country's previous name of "the Hashemite Kingdom of the
```

```
# Trans-Jordan"). So the rules for Jordan for that time apply. Major
```

```
# towns in that area are Nablus (Shchem), El-Halil (Hebron), Ramallah, and
```

```
# East Jerusalem.
```

```
#
```

```
# Both areas were
```

occupied by Israel in June 1967, but not annexed (except
for East Jerusalem). They were on Israel time since then; there might
have been a Military Governor's order about time zones, but I'm not aware
of any (such orders may have been issued semi-annually whenever summer
time was in effect, but maybe the legal aspect of time was just neglected).

The Palestinian Authority was established in 1993, and got hold of most
towns in the West Bank and Gaza by 1995. I know that in order to
demonstrate...independence, they have been switching to
summer time and back on a different schedule than Israel's, but I don't
know when this was started, or what algorithm is used (most likely the
Jordanian one).

To summarize, the table should probably look something like that:

Area \ when | 1918-1947 | 1948-1967 | 1967-1995 | 1996-
-----+-----+-----+-----+-----
Israel | Zion | Zion | Zion | Zion
West bank | Zion
| Jordan | Zion | Jordan
Gaza | Zion | Egypt | Zion | Jordan

I guess more info may be available from the PA's web page (if/when they
have one).

From Paul Eggert (2006-03-22):
Shanks & Pottenger write that Gaza did not observe DST until 1957, but go
with Shapir and assume that it observed DST from 1940 through 1947,
and that it used Jordanian rules starting in 1996.
We don't yet need a separate entry for the West Bank, since
the only differences between it and Gaza that we know about
occurred before our cutoff date of 1970.
However, as we get more information, we may need to add entries
for parts of the West Bank as they transitioned from Israel's rules
to Palestine's rules.

From IINS News Service - Israel - 1998-03-23 10:38:07 Israel time,
forwarded by Ephraim Silverberg:

Despite the fact that Israel changed over to daylight savings time
last week, the PLO Authority (PA) has decided not to turn its clocks
one-hour forward
at this time. As a sign of independence from Israeli rule,
the PA has decided to implement DST in April.

From Paul Eggert (1999-09-20):
Daoud Kuttab writes in

Holiday havoc
 (Jerusalem Post, 1999-04-22) that
the Palestinian National Authority changed to DST on 1999-04-15.
I vaguely recall that they switch back in October (sorry, forgot the source).
For now, let's assume that the spring switch was at 24:00,
and that they switch at 0:00 on the 3rd Fridays of April and October.

From Paul Eggert (2005-11-22):
Starting 2004 transitions are from Steffen Thorsen's web site timeanddate.com.

From Steffen Thorsen (2005-11-23):
A user from Gaza reported that Gaza made the change early because of
the Ramadan. Next year Ramadan will be even earlier, so I think
there is a good chance next year's end date will be around two weeks
earlier--the same goes for Jordan.

From Steffen
Thorsen (2006-08-17):
I was informed by a user in Bethlehem that in Bethlehem it started the
same day as Israel, and after checking with other users in the area, I
was informed that they started DST one day after Israel. I was not
able to find any authoritative sources at the time, nor details if
Gaza changed as well, but presumed Gaza to follow the same rules as
the West Bank.

From Steffen Thorsen (2006-09-26):
according to the Palestine News Network (2006-09-19):
http://english.pnn.ps/index.php?option=com_content&task=view&id=596&Itemid=5
> The Council of Ministers announced that this year its winter schedule
> will begin early, as of midnight Thursday. It is also time to turn
> back the clocks for winter. Friday will begin an hour late this week.
I guess it is likely that next year's date will be moved as well,
because of the Ramadan.

From Jesper Norgaard Welen (2007-09-18):
According to Steffen Thorsen's web site the Gaza Strip and the rest
of the
Palestinian territories left DST early on 13.th. of September at 2:00.

From Paul Eggert (2007-09-20):
My understanding is that Gaza and the West Bank disagree even over when
the weekend is (Thursday+Friday versus Friday+Saturday), so I'd be a bit
surprised if they agreed about DST. But for now, assume they agree.
For lack of better information, predict that future changes will be
the 2nd Thursday of September at 02:00.

From Alexander Krivenyshev (2008-08-28):
Here is an article, that Mideast running on different clocks at Ramadan.

Gaza Strip (as Egypt) ended DST at midnight Thursday (Aug 28, 2008), while
the West Bank will end Daylight Saving Time at midnight Sunday (Aug 31, 2008).

http://www.guardian.co.uk/world/feedarticle/7759001

http://www.abcnews.go.com/International/wireStory?id=5676087

or

http://www.worldtimezone.com/dst_news/dst_news_gazastrap01.html

From Alexander Krivenyshev (2009-03-26):
According to the Palestine News Network (arabic.pnn.ps), Palestinian
government decided to start Daylight Time on Thursday night March
26 and continue until the night of 27 September 2009.

(in Arabic)

http://arabic.pnn.ps/index.php?option=com_content&task=view&id=50850

or
(English translation)

http://www.worldtimezone.com/dst_news/dst_news_westbank01.html

From Steffen Thorsen (2009-08-31):
Palestine's Council of Ministers announced that they will revert back to
winter time on Friday, 2009-09-04.

One news source:

http://www.safa.ps/ara/?action=showdetail&seid=4158

(Palestinian press agency, Arabic),
Google translate: "Decided that the Palestinian government in Ramallah
headed by Salam Fayyad, the start of work in time for the winter of
2009, starting on Friday approved the fourth delay Sept. clock sixty
minutes per hour as of Friday morning."

We are not sure if Gaza will do the same, last year they had a different

end date, we will keep this page updated:

http://www.timeanddate.com/news/time/westbank-gaza-dst-2009.html

From Alexander Krivenyshev (2009-09-02):
Seems that Gaza Strip will go back to Winter Time same date as West Bank.

According to Palestinian Ministry Of Interior, West Bank and Gaza Strip plan
to change time back to Standard time on September 4, 2009.
#

"Winter time unite the West Bank and Gaza"
(from Palestinian National Authority):

http://www.moi.gov.ps/en/?page=633167343250594025&nid=11505

or

http://www.worldtimezone.com/dst_news/dst_news_gazastrip02.html

From Alexander Krivenyshev (2010-03-19):
According to Voice of Palestine DST will last for 191 days, from March
26, 2010 till "the last Sunday before the tenth day of Tishri
(October), each year" (October 03, 2010?)
#

http://palvoice.org/forums/showthread.php?t=245697

(in Arabic)

or

http://www.worldtimezone.com/dst_news/dst_news_westbank03.html

From Steffen Thorsen (2010-03-24):
...Ma'an News Agency reports that Hamas cabinet has decided it will
start one day later, at 12:01am. Not sure if they really mean 12:01am or
noon though:
#

http://www.maannews.net/eng/ViewDetails.aspx?ID=271178

(Ma'an News Agency)

"At 12:01am Friday, clocks in Israel and the West Bank will change to
1:01am, while Gaza clocks will change at 12:01am Saturday morning."

From Steffen Thorsen (2010-08-11):
According to several sources, including

http://www.maannews.net/eng/ViewDetails.aspx?ID=306795

the clocks were set back one hour at 2010-08-11 00:00:00 local time in
Gaza and the West Bank.
Some more background info:

http://www.timeanddate.com/news/time/westbank-gaza-end-dst-2010.html

From Steffen Thorsen (2011-08-26):
Gaza and the West Bank did go back to standard time in the beginning of
August, and will now enter daylight saving time again on 2011-08-30
00:00 (so two periods of DST in 2011). The pause
was because of
Ramadan.

http://www.maannews.net/eng/ViewDetails.aspx?ID=416217

Additional info:

http://www.timeanddate.com/news/time/palestine-dst-2011.html

From Alexander Krivenyshev (2011-08-27):
According to the article in The Jerusalem Post:
"...Earlier this month, the Palestinian government in the West Bank decided to
move to standard time for 30 days, during Ramadan. The Palestinians in the
Gaza Strip accepted the change and also moved their clocks one hour back.
The Hamas government said on Saturday that it won't observe summertime after
the Muslim feast of Id al-Fitr, which begins on Tuesday..."
...

http://www.jpost.com/MiddleEast/Article.aspx?id=235650

or

http://www.worldtimezone.com/dst_news/dst_news_gazastrip05.html

The rules for Egypt are stolen from the `africa' file.

From Steffen Thorsen (2011-09-30):
West Bank did end Daylight Saving Time this morning/midnight (2011-09-30)

00:00).
So West Bank and Gaza now have the same time again.

Many sources, including:

http://www.maannnews.net/eng/ViewDetails.aspx?ID=424808

From Steffen Thorsen (2012-03-26):
Palestinian news sources tell that both Gaza and West Bank will start DST
on Friday (Thursday midnight, 2012-03-29 24:00).
Some of many sources in Arabic:

http://www.samanews.com/index.php?act=Show&id=122638

http://safa.ps/details/news/74352/%D8%A8%D8%AF%D8%A1-%D8%A7%D9%84%D8%AA%D9%88%D9%82%D9%8A%D8%AA-%D8%A7%D9%84%D8%B5%D9%8A%D9%81%D9%8A-%D8%A8%D8%A7%D9%84%D8%B6%D9%81%D8%A9-%D9%88%D8%BA%D8%B2%D8%A9-%D9%84%D9%8A%D9%84%D8%A9-%D8%A7%D9%84%D8%AC%D9%85%D8%B9%D8%A9.html

Our brief summary:

http://www.timeanddate.com/news/time/gaza-west-bank-dst-2012.html

From Steffen Thorsen (2013-03-26):
The following news sources tells that Palestine will "start daylight saving
time from midnight on Friday, March 29, 2013" (translated).
[These are in Arabic and are for Gaza and for Ramallah, respectively.]
http://www.samanews.com/index.php?act=Show&id=154120
http://safa.ps/details/news/99844/%D8%B1%D8%A7%D9%85-%D8%A7%D9%84%D9%84%D9%87-%D8%A8%D8%AF%D8%A1-%D8%A7%D9%84%D8%AA%D9%88%D9%82%D9%8A%D8%AA-%D8%A7%D9%84%D8%B5%D9%8A%D9%81%D9%8A-29-%D8%A7%D9%84%D8%AC%D8%A7%D8%B1%D9%8A.html

From Paul Eggert (2013-04-15):
For future dates, guess the last Thursday in March at 24:00 through
the first Friday on or after September 21 at 01:00. This is consistent with

the predictions in today's editions of the following URLs,
which are for Gaza and Hebron respectively:
<http://www.timeanddate.com/worldclock/timezone.html?n=702>
<http://www.timeanddate.com/worldclock/timezone.html?n=2364>

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule EgyptAsia 1957 only - May 10 0:00 1:00 S

Rule EgyptAsia 1957 1958 - Oct 1 0:00 0 -

Rule EgyptAsia 1958 only - May 1 0:00 1:00 S

Rule EgyptAsia 1959 1967 - May 1 1:00 1:00 S

Rule EgyptAsia 1959 1965 - Sep 30 3:00 0 -

Rule EgyptAsia 1966 only - Oct 1 3:00 0 -

Rule Palestine 1999 2005 - Apr Fri>=15 0:00 1:00 S

Rule Palestine 1999 2003 - Oct Fri>=15 0:00 0 -

Rule Palestine 2004 only - Oct 1 1:00 0 -

Rule Palestine 2005 only - Oct 4 2:00 0 -

Rule Palestine 2006 2007 - Apr

1 0:00 1:00 S

Rule Palestine 2006 only - Sep 22 0:00 0 -

Rule Palestine 2007 only - Sep Thu>=8 2:00 0 -

Rule Palestine 2008 2009 - Mar lastFri 0:00 1:00 S

Rule Palestine 2008 only - Sep 1 0:00 0 -

Rule Palestine 2009 only - Sep Fri>=1 1:00 0 -

Rule Palestine 2010 only - Mar 26 0:00 1:00 S

Rule Palestine 2010 only - Aug 11 0:00 0 -

Rule Palestine 2011 only - Apr 1 0:01 1:00 S

Rule Palestine 2011 only - Aug 1 0:00 0 -

Rule Palestine 2011 only - Aug 30 0:00 1:00 S

Rule Palestine 2011 only - Sep 30 0:00 0 -

Rule Palestine 2012 max - Mar lastThu 24:00 1:00 S

Rule Palestine 2012 max - Sep Fri>=21 1:00 0 -

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Asia/Gaza 2:17:52 - LMT 1900 Oct

2:00 Zion EET 1948 May 15

2:00 EgyptAsia EE%sT 1967 Jun 5

2:00 Zion I%sT 1996

2:00 Jordan EE%sT 1999

2:00 Palestine EE%sT 2008 Aug 29 0:00

2:00 - EET 2008 Sep

2:00 Palestine EE%sT 2010

2:00 - EET 2010 Mar 27 0:01

2:00 Palestine EE%sT 2011 Aug 1

2:00 - EET 2012

2:00

Palestine EE%sT

Zone Asia/Hebron 2:20:23 - LMT 1900 Oct

2:00 Zion EET 1948 May 15

2:00 EgyptAsia EE%ST 1967 Jun 5

2:00 Zion I%ST 1996

2:00 Jordan EE%ST 1999

2:00 Palestine EE%ST

Paracel Is

no information

Philippines

On 1844-08-16, Narciso Claveria, governor-general of the

Philippines, issued a proclamation announcing that 1844-12-30 was to

be immediately followed by 1845-01-01. Robert H. van Gent has a

transcript of the decree in <<http://www.phys.uu.nl/~vgent/idl/idl.htm>>.

The rest of the data are from Shanks & Pottenger.

From Paul Eggert (2006-04-25):

Tomorrow's Manila Standard reports that the Philippines Department of

Trade and Industry is considering adopting DST this June when the

rainy season begins. See

<http://www.manilastandardtoday.com/?page=politics02_april26_2006>.

For now, we'll ignore this, since it's not definite and we lack details.

#

From Jesper Norgaard Welen (2006-04-26):

... claims that Philippines had DST last

time in 1990:

<http://story.philippinetimes.com/p.x/ct/9/id/145be20cc6b121c0/cid/3e5bbccc730d258c/>

[a story dated 2006-04-25 by Cris Larano of Dow Jones Newswires,

but no details]

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Phil 1936 only - Nov 1 0:00 1:00 S

Rule Phil 1937 only - Feb 1 0:00 0 -

Rule Phil 1954 only - Apr 12 0:00 1:00 S

Rule Phil 1954 only - Jul 1 0:00 0 -

Rule Phil 1978 only - Mar 22 0:00 1:00 S

Rule Phil 1978 only - Sep 21 0:00 0 -

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Manila -15:56:00 - LMT 1844 Dec 31

8:04:00 - LMT 1899 May 11

8:00 Phil PH%ST 1942 May

9:00 - JST 1944 Nov

8:00 Phil PH%ST

Qatar

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Qatar 3:26:08 - LMT 1920 # Al Dawhah / Doha

4:00 - GST 1972 Jun

3:00 - AST

Saudi Arabia

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Riyadh 3:06:52 - LMT 1950

3:00 - AST

Singapore

The data here are taken from Mok Ly Yng (2003-10-30)

<<http://www.math.nus.edu.sg/aslaksen/teaching/timezone.html>>.

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Singapore 6:55:25 - LMT 1901 Jan 1

6:55:25 - SMT 1905 Jun 1 # Singapore M.T.

7:00 - MALT 1933 Jan 1 # Malaya Time

7:00 0:20 MALST 1936 Jan 1

7:20 - MALT 1941 Sep 1

7:30 - MALT 1942 Feb 16

9:00 - JST 1945 Sep 12

7:30 - MALT 1965 Aug 9 # independence

7:30 - SGT 1982 Jan 1 # Singapore Time

8:00 - SGT

Spratly Is

no information

Sri Lanka

From Paul Eggert (2013-02-21):

Milne says "Madras mean time use from May 1, 1898. Prior to this Colombo

mean time, 5h. 4m. 21.9s. F., was used." But 5:04:21.9 differs considerably

from Colombo's meridian 5:19:24, so for now ignore Milne and stick with

Shanks and Pottenger.

From Paul Eggert (1996-09-03):

"Sri Lanka advances clock by an hour to avoid blackout"

(www.virtual-pc.com/lankaweb/news/items/240596-2.html, 1996-05-24,

no longer available as of 1999-08-17)

reported ``the country's standard time will be put

forward by one hour at

midnight Friday (1830 GMT) `in the light of the present power crisis!."

#

From Dharmasiri Senanayake, Sri Lanka Media Minister (1996-10-24), as quoted

by Shamindra in

<[news:54rka5\\$m5h@mtinsc01-mgt.ops.worldnet.att.net](mailto:news:54rka5$m5h@mtinsc01-mgt.ops.worldnet.att.net)>

Daily News - Hot News Section (1996-10-26)

:

With effect from 12.30 a.m. on 26th October 1996
Sri Lanka will be six (06) hours ahead of GMT.

From Jesper Norgaard Welen (2006-04-14), quoting Sri Lanka News Online
<<http://news.sinhalaya.com/wmview.php?ArtID=11002>> (2006-04-13):
0030 hrs on April 15, 2006 (midnight of April 14, 2006 +30 minutes)
at present, become 2400 hours of April 14, 2006 (midnight of April 14, 2006).

From Peter Apps and Ranga Sirila of Reuters (2006-04-12) in:
<http://today.reuters.co.uk/news/newsArticle.aspx?type=scienceNews&storyID=2006-04-12T172228Z_01_COL295762_RTRIDST_0_SCIENCE-SRILANKA-TIME-DC.XML>
[The Tamil Tigers] never accepted the original 1996 time change and simply
kept
their clocks set five and a half hours ahead of Greenwich Mean
Time (GMT), in line with neighbor India.

From Paul Eggert (2006-04-18):
People who live in regions under Tamil control can use [TZ='Asia/Kolkata'],
as that zone has agreed with the Tamil areas since our cutoff date of 1970.

From K Sethu (2006-04-25):
I think the abbreviation LKT originated from the world of computers at
the time of or subsequent to the time zone changes by SL Government
twice in 1996 and probably SL Government or its standardization
agencies never declared an abbreviation as a national standard.

I recollect before the recent change the government announcements
mentioning it as simply changing Sri Lanka Standard Time or Sri Lanka
Time and no mention was made about the abbreviation.

If we look at Sri Lanka Department of Government's "Official News
Website of Sri Lanka" ... <http://www.news.lk/> we can see that they
use SLT as abbreviation in time stamp at the beginning of
each news
item....

Within Sri Lanka I think LKT is well known among computer users and
administrators. In my opinion SLT may not be a good choice because the
nation's largest telcom / internet operator Sri Lanka Telecom is well
known by that abbreviation - simply as SLT (there IP domains are
slt.lk and sltnet.lk).

But if indeed our government has adopted SLT as standard abbreviation
(that we have not known so far) then it is better that it be used for
all computers.

From Paul Eggert (2006-04-25):
One possibility is that we wait for a bit for the dust to settle down
and then see what people actually say in practice.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Asia/Colombo 5:19:24 - LMT 1880

5:19:32 - MMT 1906 # Moratuwa Mean Time

5:30 - IST 1942 Jan 5

5:30 0:30 IHST 1942 Sep

5:30 1:00 IST 1945 Oct 16 2:00

5:30 - IST 1996 May 25 0:00

6:30 - LKT 1996 Oct 26 0:30

6:00 - LKT 2006 Apr 15 0:30

5:30 - IST

Syria

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Syria 1920 1923 - Apr Sun>=15 2:00 1:00 S

Rule Syria 1920 1923 - Oct Sun>=1 2:00 0 -

Rule Syria 1962 only - Apr 29 2:00 1:00 S

Rule Syria 1962 only - Oct 1 2:00 0 -

Rule Syria 1963 1965 - May 1 2:00 1:00 S

Rule Syria 1963 only - Sep 30 2:00 0 -

Rule Syria 1964 only - Oct 1 2:00 0 -

Rule Syria 1965 only - Sep 30 2:00 0 -

Rule Syria 1966 only - Apr 24 2:00 1:00 S

Rule Syria 1966 1976 - Oct 1 2:00 0 -

Rule Syria 1967 1978 - May 1 2:00 1:00 S

Rule Syria 1977 1978 - Sep 1 2:00 0 -

Rule Syria 1983 1984 - Apr 9 2:00 1:00 S

Rule Syria 1983 1984 - Oct 1 2:00 0 -

Rule Syria 1986 only - Feb 16 2:00 1:00 S

Rule Syria 1986 only - Oct 9 2:00 0 -

Rule Syria 1987 only - Mar 1 2:00 1:00 S

Rule Syria 1987 1988 - Oct 31 2:00 0 -

Rule Syria 1988 only - Mar 15 2:00 1:00 S

Rule Syria 1989 only - Mar 31 2:00 1:00 S

Rule Syria 1989 only - Oct 1 2:00 0 -

Rule Syria 1990 only - Apr 1 2:00 1:00 S

Rule Syria 1990 only - Sep 30 2:00 0 -

Rule Syria 1991 only - Apr

1 0:00 1:00 S

Rule Syria 1991 1992 - Oct

1 0:00 0 -

Rule Syria 1992 only - Apr 8 0:00 1:00 S

Rule Syria 1993 only - Mar 26 0:00 1:00 S

Rule Syria 1993 only - Sep 25 0:00 0 -

IATA SSIM (1998-02) says 1998-04-02;

(1998-09) says 1999-03-29 and 1999-09-29; (1999-02) says 1999-04-02,

2000-04-02, and 2001-04-02; (1999-09) says 2000-03-31 and 2001-03-31;

(2006) says 2006-03-31 and 2006-09-22;

```

# for now ignore all these claims and go with Shanks & Pottenger,
# except for the 2006-09-22 claim (which seems right for Ramadan).
Rule Syria 1994 1996 - Apr 1 0:00 1:00 S
Rule Syria 1994 2005 - Oct 1 0:00 0 -
Rule Syria 1997 1998 - Mar lastMon 0:00 1:00 S
Rule Syria 1999 2006 - Apr 1 0:00 1:00 S
# From Stephen Colebourne (2006-09-18):
# According to IATA data, Syria will change DST on 21st September [21:00 UTC]
# this year [only].... This is probably related to Ramadan, like Egypt.
Rule Syria 2006 only - Sep 22 0:00 0 -
# From Paul Eggert (2007-03-29):
# Today the AP reported "Syria will switch to summertime
# at midnight Thursday."
# http://www.iht.com/articles/ap/2007/03/29/africa/ME-GEN-Syria-Time-Change.php
Rule Syria 2007 only - Mar lastFri 0:00 1:00 S
# From Jesper Norgard (2007-10-27):
# The sister center ICARDA of my work CIMMYT is confirming that Syria DST will
# not take place 1.st November at 0:00 o'clock but 1.st November at 24:00 or
# rather Midnight between Thursday and Friday. This does make more sense than
# having it between Wednesday and Thursday (two workdays in Syria) since the
# weekend in Syria is not Saturday and Sunday, but Friday and Saturday. So now
# it is implemented at midnight of the last workday before weekend...
#
# From Steffen Thorsen (2007-10-27):
# Jesper Norgaard Welen wrote:
#
# > "Winter local time in Syria will be observed at midnight of Thursday 1
# > November 2007, and the clock will be put back 1 hour."
#
# I found confirmation on this in this gov.sy-article (Arabic):
# http://wehda.alwehda.gov.sy/_print_veiw.asp?FileName=12521710520070926111247
#
#
# which using Google's translate tools says:
# Council of Ministers also approved the commencement of work on
# identifying the winter time as of Friday, 2/11/2007 where the 60th
# minute delay at midnight Thursday 1/11/2007.
Rule Syria 2007 only - Nov Fri>=1 0:00 0 -

# From Stephen Colebourne (2008-03-17):
# For everyone's info, I saw an IATA time zone change for [Syria] for
# this month (March 2008) in the last day or so...This is the data IATA
# are now using:
# Country   Time Standard   --- DST Start ---   --- DST End ---   DST
# Name      Zone Variation   Time   Date       Time   Date
# Variation
# Syrian Arab
# Republic  SY   +0200   2200 03APR08   2100 30SEP08   +0300

```

2200 02APR09 2100 30SEP09 +0300
2200 01APR10 2100 30SEP10 +0300

From Arthur David Olson (2008-03-17):
Here's a link to English-language coverage by the Syrian Arab News
Agency (SANA)...

http://www.sana.sy/eng/21/2008/03/11/165173.htm
...which reads (in part) "The Cabinet approved the suggestion of the
Ministry of Electricity to begin daylight savings time on Friday April
4th, advancing clocks one hour ahead on midnight of Thursday April 3rd."
Since Syria is two hours east of UTC, the 2200 and 2100 transition times
shown above match up with midnight in Syria.

From Arthur David Olson (2008-03-18):
My best guess at a Syrian rule is "the Friday nearest April 1";
coding that involves either using a "Mar Fri>=29" construct that old time zone
compilers can't handle or having multiple Rules (a la Israel).
For now, use "Apr Fri>=1", and go with IATA on a uniform Sep 30 end.

From Steffen Thorsen (2008-10-07):
Syria has now officially decided to end DST on 2008-11-01 this year,
according to the following article in the Syrian Arab News Agency (SANA).

The article is in Arabic, and seems to tell that
they will go back to
winter time on 2008-11-01 at 00:00 local daylight time (delaying/setting
clocks back 60 minutes).

http://sana.sy/ara/2/2008/10/07/195459.htm

From Steffen Thorsen (2009-03-19):
Syria will start DST on 2009-03-27 00:00 this year according to many sources,
two examples:

http://www.sana.sy/eng/21/2009/03/17/217563.htm

(English, Syrian Arab News # Agency)

http://thawra.alwehda.gov.sy/_View_news2.asp?FileName=94459258720090318012209

(Arabic, gov-site)

We have not found any sources saying anything about when DST ends this year.

Our summary

http://www.timeanddate.com/news/time/syria-dst-starts-march-27-2009.html

From Steffen
Thorsen (2009-10-27):
The Syrian Arab News Network on 2009-09-29 reported that Syria will
revert back to winter (standard) time on midnight between Thursday
2009-10-29 and Friday 2009-10-30:

http://www.sana.sy/ara/2/2009/09/29/247012.htm (Arabic)

From Arthur David Olson (2009-10-28):
We'll see if future DST switching times turn out to be end of the last
Thursday of the month or the start of the last Friday of the month or
something else. For now, use the start of the last Friday.

From Steffen Thorsen (2010-03-17):
The "Syrian News Station" reported on 2010-03-16 that the Council of
Ministers has decided that Syria will start DST on midnight Thursday
2010-04-01: (midnight between Thursday and Friday):

http://sns.sy/sns/?path=news/read/11421 (Arabic)

From Steffen Thorsen (2012-03-26):
Today, Syria's government announced that
they will start DST early on Friday
(00:00). This is a bit earlier than the past two years.
#

From Syrian Arab News Agency, in Arabic:

http://www.sana.sy/ara/2/2012/03/26/408215.htm

Our brief summary:

http://www.timeanddate.com/news/time/syria-dst-2012.html

From Arthur David Olson (2012-03-27):
Assume last Friday in March going forward XXX.

Rule Syria 2008 only - Apr Fri>=1 0:00 1:00 S

Rule Syria 2008 only - Nov 1 0:00 0 -

Rule Syria 2009 only - Mar lastFri 0:00 1:00 S
Rule Syria 2010 2011 - Apr Fri>=1 0:00 1:00 S
Rule Syria 2012 max - Mar lastFri 0:00 1:00 S
Rule Syria 2009 max - Oct lastFri 0:00 0 -

Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Damascus 2:25:12 - LMT 1920 # Dimashq
2:00 Syria EE%sT

Tajikistan
From Shanks & Pottenger.
Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Dushanbe 4:35:12 - LMT 1924
May 2
5:00 - DUST 1930 Jun 21 # Dushanbe Time
6:00 RussiaAsia DUS%sT 1991 Mar 31 2:00s
5:00 1:00 DUSST 1991 Sep 9 2:00s
5:00 - TJT # Tajikistan Time

Thailand
Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Bangkok 6:42:04 - LMT 1880
6:42:04 - BMT 1920 Apr # Bangkok Mean Time
7:00 - ICT

Turkmenistan
From Shanks & Pottenger.
Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Ashgabat 3:53:32 - LMT 1924 May 2 # or Ashkhabad
4:00 - ASHT 1930 Jun 21 # Ashkhabad Time
5:00 RussiaAsia ASH%sT 1991 Mar 31 2:00
4:00 RussiaAsia ASH%sT 1991 Oct 27 # independence
4:00 RussiaAsia TM%sT 1992 Jan 19 2:00
5:00 - TMT

United Arab Emirates
Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Dubai 3:41:12 - LMT 1920
4:00 - GST

Uzbekistan
Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Asia/Samarkand 4:27:12 - LMT 1924 May 2
4:00 - SAMT 1930 Jun 21 # Samarkand Time
5:00 - SAMT 1981 Apr 1
5:00 1:00 SAMST 1981 Oct 1
6:00 - TAST 1982 Apr

```

1 # Tashkent Time
5:00 RussiaAsia SAM%sT 1991 Sep 1 # independence
5:00 RussiaAsia UZ%sT 1992
5:00 - UZT
Zone Asia/Tashkent 4:37:12 - LMT 1924 May 2
5:00 - TAST 1930 Jun 21 # Tashkent Time
6:00 RussiaAsia TAS%sT 1991 Mar 31 2:00
5:00 RussiaAsia TAS%sT 1991 Sep 1 # independence
5:00 RussiaAsia UZ%sT 1992
5:00 - UZT

# Vietnam

# From Paul Eggert (2013-02-21):
# Milne gives 7:16:56 for the meridian of Saigon in 1899, as being
# used in Lower Laos, Cambodia, and Annam. But this is quite a ways
# from Saigon's location. For now, ignore this and stick with Shanks
# and Pottenger.

# From Arthur David Olson (2008-03-18):
# The English-language name of Vietnam's most populous city is "Ho Chi Min City";
# we use Ho_Chi_Minh below to avoid a name of more than 14 characters.

# From Shanks & Pottenger:
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Ho_Chi_Minh 7:06:40 - LMT 1906 Jun 9
7:06:20 - SMT 1911 Mar 11 0:01 # Saigon MT?
7:00 - ICT 1912 May
8:00 - ICT 1931
May
7:00 - ICT

# Yemen

# Milne says 2:59:54 was the meridian of the saluting battery at Aden,
# and that Yemen was at 1:55:56, the meridian of the Hagia Sophia.

# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Asia/Aden 2:59:54 - LMT 1950
3:00 - AST

Found in path(s):
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/asia
No license file was found, but licenses were detected in source scan.

# This file is in the public domain, so clarified as of

```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/Makefile
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/Makefile
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/workman.sh
No license file was found, but licenses were detected in source scan.
```

```
# <pre>
```

```
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.
```

```
# From Paul Eggert (1999-11-15):
# To keep things manageable, we list only locations occupied year-round; see
# <a href="http://www.comnap.aq/comnap/comnap.nsf/P/Stations/">
# COMNAP - Stations and Bases
# </a>
# and
# <a href="http://www.spri.cam.ac.uk/bob/periant.htm">
# Summary of the Peri-Antarctic Islands (1998-07-23)
# </a>
# for information.
# Unless otherwise specified, we have no time zone information.
#
# Except for the French entries,
# I made up all time zone abbreviations mentioned here; corrections welcome!
# FORMAT is `zzz' and GMTOFF is 0 for locations while uninhabited.
```

```
# These rules are stolen from the `southamerica' file.
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule ArgAQ 1964 1966 - Mar 1 0:00 0 -
Rule ArgAQ 1964 1966 - Oct 15 0:00 1:00 S
Rule ArgAQ 1967 only - Apr 2 0:00 0 -
Rule ArgAQ 1967 1968 - Oct Sun>=1 0:00 1:00 S
Rule ArgAQ 1968 1969 - Apr Sun>=1 0:00 0 -
Rule ArgAQ 1974 only - Jan 23 0:00 1:00 S
Rule ArgAQ 1974 only - May
1 0:00 0 -
Rule ChileAQ 1972 1986 - Mar Sun>=9 3:00u 0 -
Rule ChileAQ 1974 1987 - Oct Sun>=9 4:00u 1:00 S
Rule ChileAQ 1987 only - Apr 12 3:00u 0 -
Rule ChileAQ 1988 1989 - Mar Sun>=9 3:00u 0 -
Rule ChileAQ 1988 only - Oct Sun>=1 4:00u 1:00 S
Rule ChileAQ 1989 only - Oct Sun>=9 4:00u 1:00 S
Rule ChileAQ 1990 only - Mar 18 3:00u 0 -
Rule ChileAQ 1990 only - Sep 16 4:00u 1:00 S
Rule ChileAQ 1991 1996 - Mar Sun>=9 3:00u 0 -
```


Rule ChileAQ 1991 1997 - Oct Sun>=9 4:00u 1:00 S
 Rule ChileAQ 1997 only - Mar 30 3:00u 0 -
 Rule ChileAQ 1998 only - Mar Sun>=9 3:00u 0 -
 Rule ChileAQ 1998 only - Sep 27 4:00u 1:00 S
 Rule ChileAQ 1999 only - Apr 4 3:00u 0 -
 Rule ChileAQ 1999 2010 - Oct Sun>=9 4:00u 1:00 S
 Rule ChileAQ 2000 2007 - Mar Sun>=9 3:00u 0 -
 # N.B.: the end of March 29 in Chile is March 30 in Universal time,
 # which is used below in specifying the
 transition.
 Rule ChileAQ 2008 only - Mar 30 3:00u 0 -
 Rule ChileAQ 2009 only - Mar Sun>=9 3:00u 0 -
 Rule ChileAQ 2010 only - Apr Sun>=1 3:00u 0 -
 Rule ChileAQ 2011 only - May Sun>=2 3:00u 0 -
 Rule ChileAQ 2011 only - Aug Sun>=16 4:00u 1:00 S
 Rule ChileAQ 2012 max - Apr Sun>=23 3:00u 0 -
 Rule ChileAQ 2012 max - Sep Sun>=2 4:00u 1:00 S

Argentina - year-round bases
 # Belgrano II, Confin Coast, -770227-0343737, since 1972-02-05
 # Esperanza, San Martin Land, -6323-05659, since 1952-12-17
 # Jubany, Potter Peninsula, King George Island, -6414-0602320, since 1982-01
 # Marambio, Seymour I, -6414-05637, since 1969-10-29
 # Orcadas, Laurie I, -6016-04444, since 1904-02-22
 # San Martin, Debenham I, -6807-06708, since 1951-03-21
 # (except 1960-03 / 1976-03-21)

Australia - territories
 # Heard Island, McDonald Islands (uninhabited)
 # previously sealers and scientific personnel wintered
 #
 # Margaret
 Turner reports
 # (1999-09-30) that they're UTC+5, with no DST;
 # presumably this is when they have visitors.
 #
 # year-round bases
 # Casey, Bailey Peninsula, -6617+11032, since 1969
 # Davis, Vestfold Hills, -6835+07759, since 1957-01-13
 # (except 1964-11 - 1969-02)
 # Mawson, Holme Bay, -6736+06253, since 1954-02-13

From Steffen Thorsen (2009-03-11):
 # Three Australian stations in Antarctica have changed their time zone:
 # Casey moved from UTC+8 to UTC+11
 # Davis moved from UTC+7 to UTC+5
 # Mawson moved from UTC+6 to UTC+5
 # The changes occurred on 2009-10-18 at 02:00 (local times).

```

#
# Government source: (Australian Antarctic Division)
# <a href="http://www.aad.gov.au/default.asp?casid=37079">
# http://www.aad.gov.au/default.asp?casid=37079
# </a>
#
# We have more background information here:
# <a href="http://www.timeanddate.com/news/time/antarctica-new-times.html">
# http://www.timeanddate.com/news/time/antarctica-new-times.html
# </a>

# From Steffen Thorsen (2010-03-10):
#
# We got these changes from the Australian Antarctic Division: ...
#
# - Casey station reverted to its normal time of UTC+8 on 5 March 2010.
# The change to UTC+11 is being considered as a regular summer thing but
# has not been decided yet.
#
# - Davis station will revert to its normal time of UTC+7 at 10 March 2010
# 20:00 UTC.
#
# - Mawson station stays on UTC+5.
#
# Background:
# <a href="http://www.timeanddate.com/news/time/antartica-time-changes-2010.html">
# http://www.timeanddate.com/news/time/antartica-time-changes-2010.html
# </a>

# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Antarctica/Casey 0 - zzz 1969
8:00 - WST 2009 Oct 18 2:00
# Western (Aus) Standard Time
11:00 - CAST 2010 Mar 5 2:00
# Casey Time
8:00 - WST 2011 Oct 28 2:00
11:00 - CAST 2012 Feb 21 17:00u
8:00 - WST
Zone Antarctica/Davis 0 - zzz 1957 Jan 13
7:00 - DAVT 1964 Nov # Davis Time
0 - zzz 1969 Feb
7:00 - DAVT 2009 Oct 18 2:00
5:00 - DAVT 2010 Mar 10 20:00u
7:00 - DAVT 2011
Oct 28 2:00
5:00 - DAVT 2012 Feb 21 20:00u
7:00 - DAVT
Zone Antarctica/Mawson 0 - zzz 1954 Feb 13

```

6:00 - MAWT 2009 Oct 18 2:00

Mawson Time

5:00 - MAWT

References:

Casey Weather (1998-02-26)

Davis Station, Antarctica (1998-02-26)

Mawson Station, Antarctica (1998-02-25)

Brazil - year-round base

Comandante Ferraz, King George Island, -6205+05824, since 1983/4

Chile - year-round bases and towns

Escudero, South Shetland Is, -621157-0585735, since 1994

Presidente Eduardo Frei, King George Island, -6214-05848, since 1969-03-07

General Bernardo O'Higgins, Antarctic Peninsula, -6319-05704, since 1948-02

Capitan Arturo Prat, -6230-05941

Villa Las Estrellas (a town), around the Frei base, since 1984-04-09

These locations

have always used Santiago time; use TZ='America/Santiago'.

China - year-round bases

Great Wall, King George Island, -6213-05858, since 1985-02-20

Zhongshan, Larsemann Hills, Prydz Bay, -6922+07623, since 1989-02-26

France - year-round bases

#

From Antoine Leca (1997-01-20):

Time data are from Nicole Pailleau at the IFRTP

(French Institute for Polar Research and Technology).

She confirms that French Southern Territories and Terre Adelie bases

don't observe daylight saving time, even if Terre Adelie supplies came

from Tasmania.

#

French Southern Territories with year-round inhabitants

#

Martin-de-Vivies Base, Amsterdam Island, -374105+0773155, since 1950

Alfred-Faure Base, Crozet Islands, -462551+0515152, since 1964

Port-aux-Francais, Kerguelen Islands, -492110+0701303, since 1951;

whaling & sealing station operated 1908/1914, 1920/1929, and 1951/1956

#

St Paul Island - near Amsterdam, uninhabited

fishing stations operated variously 1819/1931

```

#
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Indian/Kerguelen 0 - zzz 1950 # Port-aux-Francais
  5:00 - TFT # ISO code TF Time
#
# year-round base in the main continent
# Dumont-d'Urville, Ile des Petrels, -6640+14001, since 1956-11
#
# Another base at Port-Martin, 50km east, began operation in 1947.
# It was destroyed by fire on 1952-01-14.
#
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Antarctica/DumontDUrville 0 - zzz 1947
  10:00 - PMT 1952 Jan 14 # Port-Martin Time
  0 - zzz 1956 Nov
  10:00 - DDUT # Dumont-d'Urville Time
# Reference:
# <a href="http://en.wikipedia.org/wiki/Dumont_d'Urville_Station">
# Dumont d'Urville Station (2005-12-05)
# </a>

# Germany - year-round base
# Georg von Neumayer, -7039-00815

# India - year-round base
# Dakshin Gangotri, -7005+01200

# Japan - year-round bases
# Dome Fuji, -7719+03942
# Syowa, -690022+0393524
#
# From Hideyuki Suzuki (1999-02-06):
# In all Japanese stations, +0300 is used as the standard time.
#
# Syowa station, which is the
  first antarctic station of Japan,
# was established on 1957-01-29. Since Syowa station is still the main
# station of Japan, it's appropriate for the principal location.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Antarctica/Syowa 0 - zzz 1957 Jan 29
  3:00 - SYOT # Syowa Time
# See:
# <a href="http://www.nipr.ac.jp/english/ara01.html">
# NIPR Antarctic Research Activities (1999-08-17)
# </a>

# S Korea - year-round base

```

```

# King Sejong, King George Island, -6213-05847, since 1988

# New Zealand - claims
# Balleny Islands (never inhabited)
# Scott Island (never inhabited)
#
# year-round base
# Scott, Ross Island, since 1957-01, is like Antarctica/McMurdo.
#
# These rules for New Zealand are stolen from the `australasia' file.
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule NZAQ 1974 only - Nov 3 2:00s 1:00 D
Rule NZAQ 1975 1988 - Oct lastSun 2:00s 1:00 D
Rule NZAQ 1989 only - Oct 8 2:00s 1:00 D
Rule NZAQ 1990 2006 - Oct Sun>=1 2:00s 1:00 D
Rule NZAQ 1975 only - Feb 23 2:00s 0 S
Rule NZAQ 1976 1989 - Mar Sun>=1 2:00s 0 S
Rule NZAQ 1990 2007 - Mar Sun>=15 2:00s 0 S
Rule NZAQ 2007 max - Sep lastSun 2:00s 1:00 D
Rule NZAQ 2008 max - Apr Sun>=1 2:00s 0 S

#
# Norway - territories
# Bouvet (never inhabited)
#
# claims
# Peter I Island (never inhabited)

# Poland - year-round base
# Arctowski, King George Island, -620945-0582745, since 1977

# Russia - year-round bases
# Bellingshausen, King George Island, -621159-0585337, since 1968-02-22
# Mirny, Davis coast, -6633+09301, since 1956-02
# Molodezhnaya, Alasheyev Bay, -6740+04551,
# year-round from 1962-02 to 1999-07-01
# Novolazarevskaya, Queen Maud Land, -7046+01150,
# year-round from 1960/61 to 1992

# Vostok, since 1957-12-16, temporarily closed 1994-02/1994-11
# <a href="http://quest.arc.nasa.gov/antarctica/QA/computers/Directions,Time,ZIP">
# From Craig Mundell (1994-12-15)</a>:
# Vostok, which is one of the Russian stations, is set on the same
# time as Moscow, Russia.
#
# From Lee Hotz (2001-03-08):
# I queried

```

the folks at Columbia who spent the summer at Vostok and this is
what they had to say about time there:
``in the US Camp (East Camp) we have been on New Zealand (McMurdo)
time, which is 12 hours ahead of GMT. The Russian Station Vostok was
6 hours behind that (although only 2 miles away, i.e. 6 hours ahead
of GMT). This is a time zone I think two hours east of Moscow. The
natural time zone is in between the two: 8 hours ahead of GMT."

From Paul Eggert (2001-05-04):
This seems to be hopelessly confusing, so I asked Lee Hotz about it
in person. He said that some Antarctic locations set their local
time so that noon is the warmest part of the day, and that this
changes during the year and does not necessarily correspond to mean
solar noon. So the Vostok time might have been whatever the clocks
happened to be during their visit. So we still don't really know what time
it is at Vostok. But we'll guess UTC+6.

Zone Antarctica/Vostok 0 - zzz 1957 Dec 16
6:00 - VOST #
Vostok time

S Africa - year-round bases
Marion Island, -4653+03752
Sanae, -7141-00250

UK

British Antarctic Territories (BAT) claims
South Orkney Islands
scientific station from 1903
whaling station at Signy I 1920/1926
South Shetland Islands

year-round bases
Bird Island, South Georgia, -5400-03803, since 1983
Deception Island, -6259-06034, whaling station 1912/1931,
scientific station 1943/1967,
previously sealers and a scientific expedition wintered by accident,
and a garrison was deployed briefly
Halley, Coates Land, -7535-02604, since 1956-01-06
Halley is on a moving ice shelf and is periodically relocated
so that it is never more than 10km from its nominal location.
Rothera, Adelaide Island, -6734-6808, since 1976-12-01

From Paul Eggert (2002-10-22)
<<http://webexhibits.org/daylightsaving/g.html>> says Rothera is -03 all year.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Antarctica/Rothera 0 - zzz 1976 Dec 1
 -3:00 - ROTT #
 Rothera time

Uruguay - year round base
 # Artigas, King George Island, -621104-0585107

USA - year-round bases
 #
 # Palmer, Anvers Island, since 1965 (moved 2 miles in 1968)
 #
 # From Ethan Dicks (1996-10-06):
 # It keeps the same time as Punta Arenas, Chile, because, just like us
 # and the South Pole, that's the other end of their supply line....
 # I verified with someone who was there that since 1980,
 # Palmer has followed Chile. Prior to that, before the Falklands War,
 # Palmer used to be supplied from Argentina.
 #
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Antarctica/Palmer 0 - zzz 1965
 -4:00 ArgAQ AR%sT 1969 Oct 5
 -3:00 ArgAQ AR%sT 1982 May
 -4:00 ChileAQ CL%sT
 #
 #
 # McMurdo, Ross Island, since 1955-12
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Antarctica/McMurdo 0 - zzz 1956
 12:00 NZAQ NZ%sT
 #
 # Amundsen-Scott, South Pole, continuously occupied since 1956-11-20
 #
 # From Paul Eggert (1996-09-03):
 # Normally it wouldn't have a separate entry, since
 # it's like the
 # larger Antarctica/McMurdo since 1970, but it's too famous to omit.
 #
 # From Chris Carrier (1996-06-27):
 # Siple, the first commander of the South Pole station,
 # stated that he would have liked to have kept GMT at the station,
 # but that he found it more convenient to keep GMT+12
 # as supplies for the station were coming from McMurdo Sound,
 # which was on GMT+12 because New Zealand was on GMT+12 all year
 # at that time (1957). (Source: Siple's book 90 degrees SOUTH.)
 #
 # From Susan Smith
 # <http://www.cybertours.com/whs/pole10.html>
 # (1995-11-13 16:24:56 +1300, no longer available):

```
# We use the same time as McMurdo does.
# And they use the same time as Christchurch, NZ does....
# One last quirk about South Pole time.
# All the electric clocks are usually wrong.
# Something about the generators running at 60.1hertz or something
# makes all of the clocks run fast. So every couple of days,
# we have to go around and set them back 5 minutes or so.
# Maybe if we let them run
  fast all of the time, we'd get to leave here sooner!!
#
Link Antarctica/McMurdo Antarctica/South_Pole
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/antarctica
No license file was found, but licenses were detected in source scan.
```

```
/*
```

```
* Copyright 2004-2006 Sun Microsystems, Inc. All Rights Reserved.
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
*
* This code is free software; you can redistribute it and/or modify it
* under the terms of the GNU General Public License version 2 only, as
* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided
* by Sun in the LICENSE file that accompanied this code.
*
* This code is distributed in the hope that it will be useful, but WITHOUT
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
* version 2 for more details (a copy is included in the LICENSE file that
* accompanied this code).
*
* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to
  the Free Software Foundation,
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
*
* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
* CA 95054 USA or visit www.sun.com if you need additional information or
* have any questions.
*/
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/tools/javazic/DayOfWeek.java
No license file was found, but licenses were detected in source scan.
```



```

# <pre>
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.

# This file also includes Pacific islands.

# Notes are at the end of this file

#####

# Australia

# Please see the notes below for the controversy about "EST" versus "AEST" etc.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Aus 1917 only - Jan 1 0:01 1:00 -
Rule Aus 1917 only - Mar 25 2:00 0 -
Rule Aus 1942 only - Jan 1 2:00 1:00 -
Rule Aus 1942 only - Mar 29 2:00 0 -
Rule Aus 1942 only - Sep 27 2:00 1:00 -
Rule Aus 1943 1944 - Mar lastSun 2:00 0 -
Rule Aus 1943 only - Oct 3 2:00 1:00 -
# Go with Whitman and the Australian National Standards Commission, which
# says W Australia didn't use DST in 1943/1944. Ignore Whitman's claim that
# 1944/1945 was just like 1943/1944.

# Zone NAME GMTTOFF RULES FORMAT [UNTIL]
# Northern Territory
Zone
Australia/Darwin 8:43:20 - LMT 1895 Feb
    9:00 - CST 1899 May
    9:30 Aus CST
# Western Australia
#
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule AW 1974 only - Oct lastSun 2:00s 1:00 -
Rule AW 1975 only - Mar Sun>=1 2:00s 0 -
Rule AW 1983 only - Oct lastSun 2:00s 1:00 -
Rule AW 1984 only - Mar Sun>=1 2:00s 0 -
Rule AW 1991 only - Nov 17 2:00s 1:00 -
Rule AW 1992 only - Mar Sun>=1 2:00s 0 -
Rule AW 2006 only - Dec 3 2:00s 1:00 -
Rule AW 2007 2009 - Mar lastSun 2:00s 0 -
Rule AW 2007 2008 - Oct lastSun 2:00s 1:00 -
Zone Australia/Perth 7:43:24 - LMT 1895 Dec
    8:00 Aus WST 1943 Jul
    8:00 AW WST
Zone Australia/Eucla 8:35:28 - LMT 1895 Dec

```

8:45 Aus CWST 1943 Jul

8:45 AW CWST

Queensland

#

From Alex Livingston (1996-11-01):

I have heard or read more than once that some resort islands off the coast

of Queensland chose to keep observing daylight-saving time even after

Queensland ceased to.

#

From Paul Eggert (1996-11-22):

IATA SSIM (1993-02/1994-09)

say that the Holiday Islands (Hayman, Lindeman,

Hamilton) observed DST for two years after the rest of Queensland stopped.

Hamilton is the largest, but there is also a Hamilton in Victoria,

so use Lindeman.

#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule AQ 1971 only - Oct lastSun 2:00s 1:00 -

Rule AQ 1972 only - Feb lastSun 2:00s 0 -

Rule AQ 1989 1991 - Oct lastSun 2:00s 1:00 -

Rule AQ 1990 1992 - Mar Sun>=1 2:00s 0 -

Rule Holiday 1992 1993 - Oct lastSun 2:00s 1:00 -

Rule Holiday 1993 1994 - Mar Sun>=1 2:00s 0 -

Zone Australia/Brisbane 10:12:08 - LMT 1895

10:00 Aus EST 1971

10:00 AQ EST

Zone Australia/Lindeman 9:55:56 - LMT 1895

10:00 Aus EST 1971

10:00 AQ EST 1992 Jul

10:00 Holiday EST

South Australia

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule AS 1971 1985 - Oct lastSun 2:00s 1:00 -

Rule AS 1986 only - Oct 19 2:00s 1:00 -

Rule AS 1987 2007 - Oct lastSun 2:00s 1:00 -

Rule AS 1972 only - Feb 27 2:00s 0 -

Rule AS 1973 1985 - Mar Sun>=1 2:00s 0 -

Rule AS 1986 1990 - Mar Sun>=15 2:00s 0 -

Rule AS 1991 only - Mar 3 2:00s 0 -

Rule AS 1992 only - Mar 22 2:00s 0 -

Rule AS 1993 only - Mar 7 2:00s 0 -

Rule AS 1994 only - Mar 20 2:00s 0 -

Rule AS 1995 2005 - Mar lastSun 2:00s 0 -

Rule AS 2006 only - Apr 2 2:00s 0 -

Rule AS 2007 only - Mar lastSun 2:00s 0 -

Rule AS 2008 max - Apr Sun>=1 2:00s 0 -

```

Rule AS 2008 max - Oct Sun>=1 2:00s 1:00 -
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Australia/Adelaide 9:14:20 - LMT 1895 Feb
  9:00 - CST 1899 May
  9:30 Aus CST 1971
  9:30 AS CST

# Tasmania
#
# From Paul Eggert (2005-08-16):
# <http://www.bom.gov.au/climate/averages/tables/dst\_times.shtml>
# says King Island didn't observe DST from WWII until late 1971.
#
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule AT 1967 only - Oct Sun>=1 2:00s 1:00 -
Rule AT 1968 only - Mar lastSun 2:00s 0 -
Rule AT 1968 1985 - Oct lastSun 2:00s 1:00 -
Rule AT 1969 1971 - Mar Sun>=8 2:00s 0 -
Rule AT 1972 only - Feb lastSun 2:00s 0 -
Rule AT 1973 1981 - Mar Sun>=1 2:00s 0 -
Rule AT 1982 1983 - Mar lastSun 2:00s 0 -
Rule AT 1984 1986 - Mar Sun>=1 2:00s 0 -
Rule AT 1986 only - Oct Sun>=15 2:00s 1:00 -
Rule AT 1987 1990 - Mar Sun>=15 2:00s 0 -
Rule AT 1987 only - Oct Sun>=22 2:00s 1:00 -
Rule AT 1988 1990 - Oct lastSun 2:00s 1:00 -
Rule AT 1991 1999 - Oct Sun>=1 2:00s 1:00 -
Rule AT 1991 2005 - Mar lastSun 2:00s 0 -
Rule AT 2000 only - Aug lastSun 2:00s 1:00 -
Rule AT 2001 max - Oct Sun>=1 2:00s 1:00 -
Rule AT 2006 only - Apr Sun>=1 2:00s 0 -
Rule AT 2007 only - Mar lastSun 2:00s 0 -
Rule AT 2008 max - Apr Sun>=1 2:00s 0 -
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Australia/Hobart 9:49:16 - LMT 1895 Sep
  10:00 - EST 1916 Oct 1 2:00
  10:00 1:00 EST 1917 Feb
  10:00 Aus EST 1967
  10:00 AT EST
Zone Australia/Currie 9:35:28 - LMT 1895 Sep
  10:00 - EST 1916 Oct 1 2:00
  10:00 1:00 EST 1917 Feb
  10:00 Aus EST 1971 Jul
  10:00 AT EST

# Victoria

```

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule AV 1971 1985 - Oct lastSun 2:00s 1:00 -

Rule AV 1972 only - Feb lastSun 2:00s 0 -

Rule AV 1973 1985 - Mar Sun>=1 2:00s 0 -

Rule AV 1986 1990 - Mar Sun>=15 2:00s 0 -

Rule AV 1986 1987 - Oct Sun>=15 2:00s 1:00 -

Rule AV 1988 1999 - Oct lastSun 2:00s 1:00 -

Rule AV 1991 1994 - Mar Sun>=1 2:00s 0 -

Rule AV 1995 2005 - Mar lastSun 2:00s 0 -

Rule AV 2000 only - Aug lastSun 2:00s 1:00 -

Rule AV 2001 2007 - Oct lastSun 2:00s 1:00 -

Rule AV 2006 only - Apr Sun>=1 2:00s 0 -

Rule AV 2007 only - Mar lastSun 2:00s 0 -

Rule AV 2008 max - Apr Sun>=1 2:00s 0 -

Rule AV 2008 max - Oct Sun>=1 2:00s 1:00 -

#

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Australia/Melbourne 9:39:52 - LMT 1895 Feb

10:00 Aus EST 1971

10:00 AV EST

New South Wales

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule AN 1971 1985 - Oct lastSun 2:00s 1:00 -

Rule AN 1972 only - Feb 27 2:00s 0 -

Rule AN 1973 1981 - Mar Sun>=1 2:00s 0 -

Rule AN 1982 only - Apr Sun>=1 2:00s 0 -

Rule AN 1983 1985 - Mar Sun>=1 2:00s 0 -

Rule AN 1986 1989 - Mar Sun>=15 2:00s 0 -

Rule AN 1986 only - Oct 19 2:00s 1:00 -

Rule AN 1987 1999 - Oct lastSun 2:00s 1:00 -

Rule AN 1990 1995 - Mar Sun>=1 2:00s 0 -

Rule AN 1996 2005 - Mar lastSun 2:00s 0 -

Rule AN 2000 only - Aug lastSun 2:00s 1:00 -

Rule AN 2001 2007 - Oct lastSun 2:00s 1:00 -

Rule AN 2006 only - Apr Sun>=1 2:00s 0 -

Rule AN 2007 only - Mar lastSun 2:00s 0 -

Rule AN 2008 max - Apr Sun>=1 2:00s 0 -

Rule AN 2008 max - Oct Sun>=1 2:00s 1:00 -

#

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Australia/Sydney 10:04:52 - LMT 1895 Feb

10:00 Aus EST 1971

10:00 AN EST

Zone Australia/Broken_Hill 9:25:48 - LMT 1895 Feb

10:00 - EST 1896 Aug 23

9:00 - CST 1899 May

9:30 Aus CST 1971

9:30 AN CST 2000

9:30 AS CST

Lord Howe Island

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule LH 1981 1984 - Oct lastSun 2:00 1:00 -

Rule LH 1982 1985 - Mar Sun>=1 2:00 0 -

Rule LH 1985 only - Oct lastSun 2:00 0:30 -

Rule LH 1986 1989 - Mar Sun>=15 2:00 0 -

Rule LH 1986 only - Oct 19 2:00 0:30 -

Rule LH 1987 1999 - Oct lastSun 2:00 0:30 -

Rule LH 1990 1995 - Mar Sun>=1 2:00 0 -

Rule LH 1996 2005 - Mar lastSun 2:00 0 -

Rule LH 2000 only - Aug lastSun 2:00 0:30 -

Rule LH 2001 2007 - Oct lastSun 2:00 0:30 -

Rule LH 2006 only - Apr Sun>=1 2:00 0 -

Rule LH 2007 only - Mar lastSun 2:00 0 -

Rule LH 2008 max - Apr Sun>=1 2:00 0 -

Rule LH 2008 max - Oct Sun>=1 2:00 0:30 -

Zone

Australia/Lord_Howe 10:36:20 - LMT 1895 Feb

10:00 - EST 1981 Mar

10:30 LH LHST

Australian miscellany

#

Ashmore Is, Cartier

no indigenous inhabitants; only seasonal caretakers

no times are set

#

Coral Sea Is

no indigenous inhabitants; only meteorologists

no times are set

#

Macquarie

Permanent occupation (scientific station) 1911-1915 and since 25 March 1948;

sealing and penguin oil station operated Nov 1899 to Apr 1919. See the

Tasmania Parks & Wildlife Service history of sealing at Macquarie Island

<<http://www.parks.tas.gov.au/index.aspx?base=1828>>

<<http://www.parks.tas.gov.au/index.aspx?base=1831>>.

#

Guess that it was like Australia/Hobart while inhabited before 2010.

#

From Steffen Thorsen (2010-03-10):

We got these changes from the Australian Antarctic Division:

- Macquarie Island will stay on UTC+11 for winter and therefore not

switch back from daylight savings time when other parts of Australia do

on 4 April.

Zone Antarctica/Macquarie 0 - zzz 1899 Nov
10:00 - EST 1916 Oct 1 2:00
10:00 1:00 EST 1917 Feb
10:00 Aus EST 1919 Apr
0 - zzz 1948 Mar 25
10:00 Aus EST 1967
10:00 AT EST 2010 Apr 4 3:00
11:00 - MIST # Macquarie I Standard Time

Christmas
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Indian/Christmas 7:02:52 - LMT 1895 Feb
7:00 - CXT # Christmas Island Time

Cook Is
From Shanks & Pottenger:
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Cook 1978 only - Nov 12 0:00 0:30 HS
Rule Cook 1979 1991 - Mar Sun>=1 0:00 0 -
Rule Cook 1979 1990 - Oct lastSun 0:00 0:30 HS
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Rarotonga -10:39:04
- LMT 1901 # Avarua
-10:30 - CKT 1978 Nov 12 # Cook Is Time
-10:00 Cook CK%ST

Cocos
These islands were ruled by the Ross family from about 1830 to 1978.
We don't know when standard time was introduced; for now, we guess 1900.
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Indian/Cocos 6:27:40 - LMT 1900
6:30 - CCT # Cocos Islands Time

Fiji

Milne gives 11:55:44 for Suva.

From Alexander Krivenyshev (2009-11-10):
According to Fiji Broadcasting Corporation, Fiji plans to re-introduce DST
from November 29th 2009 to April 25th 2010.

"Daylight savings to commence this month"

http://www.radiofiji.com.fj/fullstory.php?id=23719

or

http://www.worldtimezone.com/dst_news/dst_news_fiji01.html

From Steffen Thorsen (2009-11-10):
The Fiji Government has posted some more details about the approved

amendments:

http://www.fiji.gov.fj/publish/page_16198.shtml

From Steffen Thorsen (2010-03-03):
The Cabinet in Fiji has decided to end DST about a month early, on
2010-03-28 at 03:00.
The plan is to observe DST again, from 2010-10-24 to sometime in March
2011 (last Sunday a good guess?).

Official source:

http://www.fiji.gov.fj/index.php?option=com_content&view=article&id=1096:3310-cabinet-approves-change-in-daylight-savings-dates&catid=49:cabinet-releases&Itemid=166

A bit more background info here:

http://www.timeanddate.com/news/time/fiji-dst-ends-march-2010.html

From Alexander Krivenyshev (2010-10-24):
According
to Radio Fiji and Fiji Times online, Fiji will end DST 3
weeks earlier than expected - on March 6, 2011, not March 27, 2011...
Here is confirmation from Government of the Republic of the Fiji Islands,
Ministry of Information (fiji.gov.fj) web site:

http://www.fiji.gov.fj/index.php?option=com_content&view=article&id=2608:daylight-savings&catid=71:press-releases&Itemid=155

or

http://www.worldtimezone.com/dst_news/dst_news_fiji04.html

From Steffen Thorsen (2011-10-03):
Now the dates have been confirmed, and at least our start date
assumption was correct (end date was one week wrong).
#

```

# <a href="http://www.fiji.gov.fj/index.php?option=com_content&view=article&id=4966:daylight-saving-starts-in-
fiji&catid=71:press-releases&Itemid=155">
# www.fiji.gov.fj/index.php?option=com_content&view=article&id=4966:daylight-saving-starts-in-
fiji&catid=71:press-releases&Itemid=155
#
</a>
# which says
# Members of the public are reminded to change their time to one hour in
# advance at 2am to 3am on October 23, 2011 and one hour back at 3am to
# 2am on February 26 next year.

# From Ken Rylander (2011-10-24)
# Another change to the Fiji DST end date. In the TZ database the end date for
# Fiji DST 2012, is currently Feb 26. This has been changed to Jan 22.
#
# <a href="http://www.fiji.gov.fj/index.php?option=com_content&view=article&id=5017:amendments-to-daylight-
savings&catid=71:press-releases&Itemid=155">
# http://www.fiji.gov.fj/index.php?option=com_content&view=article&id=5017:amendments-to-daylight-
savings&catid=71:press-releases&Itemid=155
# </a>
# states:
#
# The end of daylight saving scheduled initially for the 26th of February 2012
# has been brought forward to the 22nd of January 2012.
# The commencement of daylight saving will remain
# unchanged and start
# on the 23rd of October, 2011.

# From the Fiji Government Online Portal (2012-08-21) via Steffen Thorsen:
# The Minister for Labour, Industrial Relations and Employment Mr Jone Usamate
# today confirmed that Fiji will start daylight savings at 2 am on Sunday 21st
# October 2012 and end at 3 am on Sunday 20th January 2013.
# http://www.fiji.gov.fj/index.php?option=com_content&view=article&id=6702&catid=71&Itemid=155
#
# From Paul Eggert (2012-08-31):
# For now, guess a pattern of the penultimate Sundays in October and January.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Fiji 1998 1999 - Nov Sun>=1 2:00 1:00 S
Rule Fiji 1999 2000 - Feb lastSun 3:00 0 -
Rule Fiji 2009 only - Nov 29 2:00 1:00 S
Rule Fiji 2010 only - Mar lastSun 3:00 0 -
Rule Fiji 2010 max - Oct Sun>=18 2:00 1:00 S
Rule Fiji 2011 only - Mar Sun>=1 3:00 0 -
Rule Fiji 2012 max - Jan Sun>=18 3:00 0 -
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Fiji 11:55:44 - LMT 1915 Oct 26 # Suva
12:00 Fiji FJ%sT #

```


Fiji Time

French Polynesia

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Gambier -8:59:48 - LMT 1912 Oct # Rikitea
-9:00 - GAMT # Gambier Time

Zone Pacific/Marquesas -9:18:00 - LMT 1912 Oct
-9:30 - MART # Marquesas Time

Zone Pacific/Tahiti -9:58:16 - LMT 1912 Oct # Papeete
-10:00 - TAHT # Tahiti Time

Clipperton (near North America) is administered from French Polynesia;
it is uninhabited.

Guam

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Guam -14:21:00 - LMT 1844 Dec 31
9:39:00 - LMT 1901 # Agana
10:00 - GST 2000 Dec 23 # Guam
10:00 - ChST # Chamorro Standard Time

Kiribati

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Tarawa 11:32:04 - LMT 1901 # Bairiki
12:00 - GILT # Gilbert Is Time

Zone Pacific/Enderbury -11:24:20 - LMT 1901
-12:00 - PHOT 1979 Oct # Phoenix Is Time
-11:00 - PHOT 1995
13:00 - PHOT

Zone Pacific/Kiritimati -10:29:20 - LMT 1901
-10:40 - LINT 1979 Oct # Line Is Time
-10:00 - LINT 1995

14:00 - LINT

N Mariana Is

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Saipan -14:17:00 - LMT 1844 Dec 31
9:43:00 - LMT 1901
9:00 - MPT 1969 Oct # N Mariana Is Time
10:00 - MPT 2000 Dec 23
10:00 - ChST # Chamorro Standard Time

Marshall Is

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Majuro 11:24:48 - LMT 1901
11:00 - MHT 1969 Oct # Marshall Islands Time
12:00 - MHT

Zone Pacific/Kwajalein 11:09:20 - LMT 1901

11:00 - MHT 1969 Oct
-12:00 - KWAT 1993 Aug 20 # Kwajalein Time
12:00 - MHT

Micronesia
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Chuuk 10:07:08 - LMT 1901
10:00 - CHUT # Chuuk Time
Zone Pacific/Pohnpei 10:32:52 - LMT 1901 # Kolonia
11:00 - PONT # Pohnpei Time
Zone Pacific/Kosrae 10:51:56 - LMT 1901
11:00 - KOST 1969 Oct # Kosrae Time
12:00 - KOST 1999
11:00 - KOST

Nauru
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Nauru 11:07:40 - LMT 1921 Jan 15 # Uaobe
11:30 - NRT 1942
Mar 15 # Nauru Time
9:00 - JST 1944 Aug 15
11:30 - NRT 1979 May
12:00 - NRT

New Caledonia
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule NC 1977 1978 - Dec Sun>=1 0:00 1:00 S
Rule NC 1978 1979 - Feb 27 0:00 0 -
Rule NC 1996 only - Dec 1 2:00s 1:00 S
Shanks & Pottenger say the following was at 2:00; go with IATA.
Rule NC 1997 only - Mar 2 2:00s 0 -
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Noumea 11:05:48 - LMT 1912 Jan 13
11:00 NC NC%sT

#####

New Zealand
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule NZ 1927 only - Nov 6 2:00 1:00 S
Rule NZ 1928 only - Mar 4 2:00 0 M
Rule NZ 1928 1933 - Oct Sun>=8 2:00 0:30 S
Rule NZ 1929 1933 - Mar Sun>=15 2:00 0 M
Rule NZ 1934 1940 - Apr lastSun 2:00 0 M
Rule NZ 1934 1940 - Sep lastSun 2:00 0:30 S
Rule NZ 1946 only - Jan 1 0:00 0 S

```

# Since 1957 Chatham has been 45 minutes ahead of NZ, but there's no
# convenient notation
# for this so we must duplicate the Rule lines.
Rule NZ 1974 only - Nov Sun>=1 2:00s 1:00 D
Rule Chatham 1974 only - Nov Sun>=1 2:45s 1:00 D
Rule NZ 1975 only - Feb lastSun 2:00s 0 S
Rule Chatham 1975 only - Feb lastSun 2:45s 0 S
Rule NZ 1975 1988 - Oct lastSun 2:00s 1:00 D
Rule Chatham 1975 1988 - Oct lastSun 2:45s 1:00 D
Rule NZ 1976 1989 - Mar Sun>=1 2:00s 0 S
Rule Chatham 1976 1989 - Mar Sun>=1 2:45s 0 S
Rule NZ 1989 only - Oct Sun>=8 2:00s 1:00 D
Rule Chatham 1989 only - Oct Sun>=8 2:45s 1:00 D
Rule NZ 1990 2006 - Oct Sun>=1 2:00s 1:00 D
Rule Chatham 1990 2006 - Oct Sun>=1 2:45s 1:00 D
Rule NZ 1990 2007 - Mar Sun>=15 2:00s 0 S
Rule Chatham 1990 2007 - Mar Sun>=15 2:45s 0 S
Rule NZ 2007 max - Sep lastSun 2:00s 1:00 D
Rule Chatham 2007 max - Sep lastSun 2:45s 1:00 D
Rule NZ 2008 max - Apr Sun>=1 2:00s 0 S
Rule Chatham 2008 max - Apr Sun>=1 2:45s 0 S
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Auckland 11:39:04 - LMT 1868 Nov 2
    11:30 NZ NZ%sT 1946 Jan 1
    12:00 NZ NZ%sT
Zone
Pacific/Chatham 12:13:48 - LMT 1957 Jan 1
    12:45 Chatham CHA%sT

# Auckland Is
# uninhabited; Maori and Moriori, colonial settlers, pastoralists, sealers,
# and scientific personnel have wintered

# Campbell I
# minor whaling stations operated 1909/1914
# scientific station operated 1941/1995;
# previously whalers, sealers, pastoralists, and scientific personnel wintered
# was probably like Pacific/Auckland

#####

# Niue
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Niue -11:19:40 - LMT 1901 # Alofi
    -11:20 - NUT 1951 # Niue Time
    -11:30 - NUT 1978 Oct 1

```

-11:00 - NUT

Norfolk

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Norfolk 11:11:52 - LMT 1901 # Kingston

11:12 - NMT 1951 # Norfolk Mean Time

11:30 - NFT # Norfolk Time

Palau (Belau)

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Palau 8:57:56 - LMT 1901 # Koror

9:00 - PWT # Palau Time

Papua

New Guinea

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Port_Moresby 9:48:40 - LMT 1880

9:48:32 - PMMT 1895 # Port Moresby Mean Time

10:00 - PGT # Papua New Guinea Time

Pitcairn

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Pitcairn -8:40:20 - LMT 1901 # Adamstown

-8:30 - PNT 1998 Apr 27 00:00

-8:00 - PST # Pitcairn Standard Time

American Samoa

Zone Pacific/Pago_Pago 12:37:12 - LMT 1879 Jul 5

-11:22:48 - LMT 1911

-11:30 - SAMT 1950 # Samoa Time

-11:00 - NST 1967 Apr # N=Nome

-11:00 - BST 1983 Nov 30 # B=Bering

-11:00 - SST # S=Samoa

Samoa

From Steffen Thorsen (2009-10-16):

We have been in contact with the government of Samoa again, and received

the following info:

#

"Cabinet has now approved Daylight Saving to be effected next year

commencing from the last Sunday of September 2010 and conclude first

Sunday of April 2011."

#

Background info:

#

<http://www.timeanddate.com/news/time/samoa-dst-plan-2009.html>

Samoa's Daylight Saving Time Act 2009 is available here, but does not
contain any dates:

http://www.parliament.gov.ws/documents/acts/Daylight%20Saving%20Act%20%202009%20%28English%29%20-%20Final%207-7-091.pdf

From Laupue Raymond Hughes (2010-10-07):
Please see

http://www.mcil.gov.ws
,
the Ministry of Commerce, Industry and Labour (sideframe) "Last Sunday
September 2010 (26/09/10) - adjust clocks forward from 12:00 midnight
to 01:00am and First Sunday April 2011 (03/04/11) - adjust clocks
backwards from 1:00am to 12:00am"

From Laupue Raymond Hughes (2011-03-07):
I believe this will be posted shortly on the website

www.mcil.gov.ws

#

PUBLIC NOTICE ON DAYLIGHT SAVING
TIME

Pursuant to the Daylight Saving Act 2009 and Cabinets decision,
businesses and the general public are hereby advised that daylight
saving time is on the first Saturday of April 2011 (02/04/11).

The public is therefore advised that when the standard time strikes
the hour of four oclock (4.00am or 0400 Hours) on the 2nd April 2011,
then all instruments used to measure standard time are to be
adjusted/changed to three oclock (3:00am or 0300Hrs).

Margaret Fruean ACTING CHIEF EXECUTIVE OFFICER MINISTRY OF COMMERCE,
INDUSTRY AND LABOUR 28th February 2011

From David Zuelke (2011-05-09):
Subject: Samoa to move timezone from east to west of international date line

<http://www.morningstar.co.uk/uk/markets/newsfeeditem.aspx?id=138501958347963>

From Mark Sim-Smith (2011-08-17):

I have been in contact with Leilani Tuala Warren from the Samoa Law Reform Commission,

and she has sent me a copy of the Bill that she

confirmed has been passed...Most of the sections are about maps rather

than the time zone change, but I'll paste the relevant bits below. But

the essence is that at midnight 29 Dec (UTC-11 I suppose), Samoa

changes from UTC-11 to UTC+13:

#

International Date Line Bill 2011

#

AN ACT to provide for the change to standard time in Samoa and to make

consequential amendments to the position of the International Date

Line, and for related purposes.

#

BE IT ENACTED by the Legislative Assembly of Samoa in Parliament

assembled as follows:

#

1. Short title and commencement-(1) This Act may be cited as the

International Date Line Act 2011. (2) Except for section 5(3) this Act

commences at 12 o'clock midnight, on Thursday 29th December 2011. (3)

Section 5(3) commences on the date of assent by the Head of State.

#

[snip]

#

3. Interpretation - [snip] "Samoa standard time" in this Act and any

other statute of Samoa

which refers to 'Samoa standard time' means the

time 13 hours in advance of Co-ordinated Universal Time.

#

4. Samoa standard time - (1) Upon the commencement of this Act, Samoa

standard time shall be set at 13 hours in advance of Co-ordinated

Universal Time for the whole of Samoa. (2) All references to Samoa's

time zone and to Samoa standard time in Samoa in all legislation and

instruments after the commencement of this Act shall be references to

Samoa standard time as provided for in this Act. (3) Nothing in this

Act affects the provisions of the Daylight Saving Act 2009, except that

it defines Samoa standard time....

From Laupue Raymond Hughes (2011-09-02):

http://www.mcil.gov.ws/mcil_publications.html

#

here is the official website publication for Samoa DST and dateline change

```

#
# DST
# Year End Time Start Time
# 2011 - - - - - 24 September 3:00am to 4:00am
# 2012 01 April 4:00am to 3:00am -
- - - - -
#
# Dateline Change skip Friday 30th Dec 2011
# Thursday 29th December 2011 23:59:59 Hours
# Saturday 31st December 2011 00:00:00 Hours
#
# Clarification by Tim Parenti (2012-01-03):
# Although Samoa has used Daylight Saving Time in the 2010-2011 and 2011-2012
# seasons, there is not yet any indication that this trend will continue on
# a regular basis. For now, we have explicitly listed the transitions below.
#
# From Nicky (2012-09-10):
# Daylight Saving Time commences on Sunday 30th September 2012 and
# ends on Sunday 7th of April 2013.
#
# Please find link below for more information.
# http://www.mcil.gov.ws/mcil\_publications.html
#
# That publication also includes dates for Summer of 2013/4 as well
# which give the impression of a pattern in selecting dates for the
# future, so for now, we will guess this will continue.

# Western Samoa
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule WS 2012 max - Sep lastSun 3:00 1 D
Rule WS 2012 max - Apr Sun>=1 4:00 0 -
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone
Pacific/Apia 12:33:04 - LMT 1879 Jul 5
-11:26:56 - LMT 1911
-11:30 - SAMT 1950 # Samoa Time
-11:00 - WST 2010 Sep 26
-11:00 1:00 WSDT 2011 Apr 2 4:00
-11:00 - WST 2011 Sep 24 3:00
-11:00 1:00 WSDT 2011 Dec 30
13:00 1:00 WSDT 2012 Apr Sun>=1 4:00
13:00 WS WS%sT

# Solomon Is
# excludes Bougainville, for which see Papua New Guinea
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Guadalcanal 10:39:48 - LMT 1912 Oct # Honiara
11:00 - SBT # Solomon Is Time

```

Tokelau Is

From Gwillim Law (2011-12-29)
A correspondent informed me that Tokelau, like Samoa, will be skipping
December 31 this year ...

From Steffen Thorsen (2012-07-25)
... we double checked by calling hotels and offices based in Tokelau asking
about the time there, and they all told a time that agrees with UTC+13....
Shanks says UTC-10 from 1901 [but] ... there is a good chance the change
actually was to UTC-11 back then.

From Paul
Eggert (2012-07-25)
A Google Books snippet of Appendix to the Journals of the House of
Representatives of New Zealand, Session 1948,
<<http://books.google.com/books?id=ZaVCAQAIAAJ>>, page 65, says Tokelau
was "11 hours slow on G.M.T." Go with Thorsen and assume Shanks & Pottenger
are off by an hour starting in 1901.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Fakaofu -11:24:56 - LMT 1901
-11:00 - TKT 2011 Dec 30 # Tokelau Time
13:00 - TKT

Tonga

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Tonga 1999 only - Oct 7 2:00s 1:00 S
Rule Tonga 2000 only - Mar 19 2:00s 0 -
Rule Tonga 2000 2001 - Nov Sun>=1 2:00 1:00 S
Rule Tonga 2001 2002 - Jan lastSun 2:00 0 -

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Tongatapu 12:19:20 - LMT 1901
12:20 - TOT 1941 # Tonga Time
13:00 - TOT 1999
13:00 Tonga TO%sT

Tuvalu

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Funafuti 11:56:52 - LMT 1901
12:00 - TVT # Tuvalu Time

US minor outlying
islands

Howland, Baker

Howland was mined for guano by American companies 1857-1878 and British
1886-1891; Baker was similar but exact dates are not known.
Inhabited by civilians 1935-1942; U.S. military bases 1943-1944;
uninhabited thereafter.
Howland observed Hawaii Standard Time (UTC-10:30) in 1937;
see page 206 of Elgen M. Long and Marie K. Long,
Amelia Earhart: the Mystery Solved, Simon & Schuster (2000).
So most likely Howland and Baker observed Hawaii Time from 1935
until they were abandoned after the war.

Jarvis
Mined for guano by American companies 1857-1879 and British 1883?-1891?.
Inhabited by civilians 1935-1942; IGY scientific base 1957-1958;
uninhabited thereafter.
no information; was probably like Pacific/Kiritimati

Johnston
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Pacific/Johnston -10:00 - HST

Kingman
uninhabited

Midway

From Mark Brader (2005-01-23):
[Fallacies and Fantasies of Air Transport History, by R.E.G. Davies,

published 1994 by Paladwr Press, McLean, VA, USA; ISBN 0-9626483-5-3]
reproduced a Pan American Airways timeables from 1936, for their weekly
"Orient Express" flights between San Francisco and Manila, and connecting
flights to Chicago and the US East Coast. As it uses some time zone
designations that I've never seen before:....
Fri. 6:30A Lv. HONOLOLU (Pearl Harbor), H.I. H.L.T. Ar. 5:30P Sun.
" 3:00P Ar. MIDWAY ISLAND M.L.T. Lv. 6:00A "

Zone Pacific/Midway -11:49:28 - LMT 1901
-11:00 - NST 1956 Jun 3
-11:00 1:00 NDT 1956 Sep 2
-11:00 - NST 1967 Apr # N=Nome
-11:00 - BST 1983 Nov 30 # B=Bering
-11:00 - SST # S=Samoa

Palmyra
uninhabited since World War II; was probably like Pacific/Kiritimati

Wake
Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Wake 11:06:28 - LMT 1901

12:00 - WAKT # Wake Time

Vanuatu

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Vanuatu 1983 only - Sep 25 0:00 1:00 S

Rule Vanuatu 1984 1991 - Mar Sun>=23 0:00 0 -

Rule Vanuatu 1984 only - Oct 23 0:00 1:00 S

Rule Vanuatu 1985 1991 - Sep Sun>=23 0:00 1:00 S

Rule Vanuatu 1992 1993 - Jan Sun>=23 0:00 0 -

Rule Vanuatu 1992 only - Oct Sun>=23 0:00 1:00 S

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Efate 11:13:16 - LMT 1912 Jan 13 # Vila

11:00 Vanuatu VU%ST # Vanuatu Time

Wallis and Futuna

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Pacific/Wallis 12:15:20 - LMT 1901

12:00 - WFT # Wallis & Futuna Time

#####

NOTES

This data is by no means authoritative; if you think you know better,

go ahead and edit the file (and please send any changes to

tz@iana.org for general use in the future).

From Paul Eggert (2013-02-21):

A good source for time zone historical data outside the U.S. is

Thomas G. Shanks and Rique Pottenger, The International Atlas (6th edition),

San Diego: ACS Publications, Inc. (2003).

#

Gwillim

Law writes that a good source

for recent time zone data is the International Air Transport

Association's Standard Schedules Information Manual (IATA SSIM),

published semiannually. Law sent in several helpful summaries

of the IATA's data after 1990.

#

Except where otherwise noted, Shanks & Pottenger is the source for

entries through 1990, and IATA SSIM is the source for entries afterwards.

#

Another source occasionally used is Edward W. Whitman, World Time Differences,

Whitman Publishing Co, 2 Niagara Av, Ealing, London (undated), which

I found in the UCLA library.

```

#
# For data circa 1899, a common source is:
# Milne J. Civil time. Geogr J. 1899 Feb;13(2):173-94
# <http://www.jstor.org/stable/1774359>.
#
# A reliable and entertaining source about time zones is
# Derek Howse, Greenwich time and longitude, Philip Wilson Publishers (1997).
#
# I invented the abbreviations marked `*' in the following table;
# the rest are from earlier versions of this file, or from other
# sources.
# Corrections are welcome!
# std dst
# LMT Local Mean Time
# 8:00 WST WST Western Australia
# 8:45 CWST CWST Central Western Australia*
# 9:00 JST Japan
# 9:30 CST CST Central Australia
# 10:00 EST EST Eastern Australia
# 10:00 ChST Chamorro
# 10:30 LHST LHST Lord Howe*
# 11:30 NZMT NZST New Zealand through 1945
# 12:00 NZST NZDT New Zealand 1946-present
# 12:45 CHAST CHADT Chatham*
# -11:00 SST Samoa
# -10:00 HST Hawaii
# - 8:00 PST Pitcairn*
#
# See the `northamerica' file for Hawaii.
# See the `southamerica' file for Easter I and the Galapagos Is.

#####

# Australia

# From Paul Eggert (2005-12-08):
# <a href="http://www.bom.gov.au/climate/averages/tables/dst_times.shtml">
# Implementation Dates of Daylight Saving Time within Australia
# </a> summarizes daylight saving issues in Australia.

# From Arthur David Olson (2005-12-12):
# <a
href="http://www.lawlink.nsw.gov.au/lawlink/Corporate/ll_agdinfo.nsf/pages/community_relations_daylight_savin
g">
#
# Lawlink NSW:Daylight Saving in New South Wales
# </a> covers New South Wales in particular.

```

From John Mackin (1991-03-06):
We in Australia have `_never_` referred to DST as ``daylight'` time.
It is called ``summer'` time. Now by a happy coincidence, ``summer'`
and ``standard'` happen to start with the same letter; hence, the
abbreviation does `_not_` change...
The legislation does not actually define abbreviations, at least
in this State, but the abbreviation is just commonly taken to be the
initials of the phrase, and the legislation here uniformly uses
the phrase ``summer time'` and does not use the phrase ``daylight
time'`.
Announcers on the Commonwealth radio network, the ABC (for Australian
Broadcasting Commission), use the phrases ``Eastern Standard Time'`
or ``Eastern Summer Time'`. (Note, though, that as I say in the
current australasia file, there is really no such thing.) Announcers
on its overseas
service, Radio Australia, use the same phrases
prefixed by the word ``Australian'` when referring to local times;
time announcements on that service, naturally enough, are made in UTC.

From Arthur David Olson (1992-03-08):
Given the above, what's chosen for year-round use is:
CST for any place operating at a GMTOFF of 9:30
WST for any place operating at a GMTOFF of 8:00
EST for any place operating at a GMTOFF of 10:00

From Chuck Soper (2006-06-01):
I recently found this Australian government web page on time zones:
`<http://www.australia.gov.au/about-australia-13time>`
And this government web page lists time zone names and abbreviations:
`<http://www.bom.gov.au/climate/averages/tables/daysavtm.shtml>`

From Paul Eggert (2001-04-05), summarizing a long discussion about "EST"
versus "AEST" etc.:

I see the following points of dispute:

* How important are unique time zone abbreviations?

Here I tend to agree with the point (most recently made by Chris

Newman) that unique abbreviations should not be essential for proper
operation of software. We have other instances of ambiguity
(e.g. "IST" denoting both "Israel Standard Time" and "Indian
Standard Time"), and they are not likely to go away any time soon.
In the old days, some software mistakenly relied on unique
abbreviations, but this is becoming less true with time, and I don't
think it's that important to cater to such software these days.
#

On the other hand, there is another motivation for unambiguous
abbreviations: it cuts down on human confusion. This is
particularly true for Australia, where "EST" can mean one thing for
time T and a different thing for time T plus 1 second.

* Does the relevant legislation indicate which abbreviations should be used?

Here I tend to think that things are a mess, just as they are in
many other countries. We Americans are currently disagreeing about
which abbreviation to use for the
newly legislated Chamorro Standard
Time, for example.

Personally, I would prefer to use common practice; I would like to
refer to legislation only for examples of common practice, or as a
tiebreaker.

* Do Australians more often use "Eastern Daylight Time" or "Eastern
Summer Time"? Do they typically prefix the time zone names with
the word "Australian"?

My own impression is that both "Daylight Time" and "Summer Time" are
common and are widely understood, but that "Summer Time" is more
popular; and that the leading "A" is also common but is omitted more
often than not. I just used AltaVista advanced search and got the
following count of page hits:

1,103 "Eastern Summer Time" AND domain:au
971 "Australian Eastern Summer Time" AND domain:au
613 "Eastern Daylight Time" AND domain:au
127 "Australian Eastern Daylight Time" AND domain:au

Here "Summer" seems quite a bit more popular than "Daylight",

particularly when we know the time zone is Australian and not US,
say. The "Australian" prefix seems to be popular for Eastern Summer
Time, but unpopular for Eastern Daylight Time.

For abbreviations, tools like AltaVista are less useful because of
ambiguity. Many hits are not really time zones, unfortunately, and
many hits denote US time zones and not Australian ones. But here
are the hit counts anyway:

161,304 "EST" and domain:au
25,156 "EDT" and domain:au
18,263 "AEST" and domain:au
10,416 "AEDT" and domain:au
#

```
# 14,538 "CST" and domain:au
# 5,728 "CDT" and domain:au
# 176 "ACST" and domain:au
# 29 "ACDT" and domain:au
#
# 7,539 "WST" and domain:au
# 68 "AWST" and domain:au
#
# This data suggest that Australians tend to omit the "A" prefix in
# practice. The situation for "ST" versus "DT" is less clear, given
# the ambiguities involved.
#
# * How do Australians feel about the
# abbreviations in the tz database?
#
# If you just count Australians on this list, I count 2 in favor and 3
# against. One of the "against" votes (David Keegel) counseled delay,
# saying that both AEST/AEDT and EST/EST are widely used and
# understood in Australia.

# From Paul Eggert (1995-12-19):
# Shanks & Pottenger report 2:00 for all autumn changes in Australia and NZ.
# Mark Prior writes that his newspaper
# reports that NSW's fall 1995 change will occur at 2:00,
# but Robert Elz says it's been 3:00 in Victoria since 1970
# and perhaps the newspaper's `2:00' is referring to standard time.
# For now we'll continue to assume 2:00s for changes since 1960.

# From Eric Ulevik (1998-01-05):
#
# Here are some URLs to Australian time legislation. These URLs are stable,
# and should probably be included in the data file. There are probably more
# relevant entries in this database.
#
# NSW (including LHI and Broken Hill):
# <a href="http://www.austlii.edu.au/au/legis/nsw/consol_act/sta1987137/index.html">
#
# Standard Time Act 1987 (updated 1995-04-04)
# </a>
# ACT
# <a href="http://www.austlii.edu.au/au/legis/act/consol_act/stasta1972279/index.html">
# Standard Time and Summer Time Act 1972
# </a>
# SA
# <a href="http://www.austlii.edu.au/au/legis/sa/consol_act/sta1898137/index.html">
# Standard Time Act, 1898
# </a>
```

From David Grosz (2005-06-13):
It was announced last week that Daylight Saving would be extended by
one week next year to allow for the 2006 Commonwealth Games.
Daylight Saving is now to end for next year only on the first Sunday
in April instead of the last Sunday in March.

From Gwillim Law (2005-06-14):
I did some Googling and found that all of those states (and territory) plan
to extend DST together in 2006.
ACT: <http://www.cmd.act.gov.au/mediareleases/fileread.cfm?file=86.txt>
New South Wales:
http://www.thecouriermail.news.com.au/common/story_page/0,5936,15538869%255E1702,00.html
South Australia: <http://www.news.com.au/story/0,10117,15555031-1246,00.html>

Tasmania: <http://www.media.tas.gov.au/release.php?id=14772>
Victoria: I wasn't able to find anything separate, but the other articles
allude to it.
But not Queensland
<http://www.news.com.au/story/0,10117,15564030-1248,00.html>.

Northern Territory

From George Shepherd via Simon Woodhead via Robert Elz (1991-03-06):
The NORTHERN TERRITORY.. [Courtesy N.T. Dept of the Chief Minister]
[Nov 1990]
N.T. have never utilised any DST due to sub-tropical/tropical location.
...
Zone Australia/North 9:30 - CST

From Bradley White (1991-03-04):
A recent excerpt from an Australian newspaper...
the Northern Territory do[es] not have daylight saving.

Western Australia

From George Shepherd via Simon Woodhead via Robert Elz (1991-03-06):
The state of WESTERN AUSTRALIA.. [Courtesy W.A. dept Premier+Cabinet]
[Nov 1990]
W.A. suffers from a great deal of public and political
opposition to
DST in principle. A bill is brought before parliament in most years, but
usually defeated either in the upper house, or in party caucus
before reaching parliament.
...
Zone Australia/West 8:00 AW %sST
...
Rule AW 1974 only - Oct lastSun 2:00 1:00 D
Rule AW 1975 only - Mar Sun>=1 3:00 0 W

Rule AW 1983 only - Oct lastSun 2:00 1:00 D
Rule AW 1984 only - Mar Sun>=1 3:00 0 W

From Bradley White (1991-03-04):
A recent excerpt from an Australian newspaper...
Western Australia...do[es] not have daylight saving.

From John D. Newman via Bradley White (1991-11-02):
Western Australia is still on "winter time". Some DH in Sydney
rang me at home a few days ago at 6.00am. (He had just arrived at
work at 9.00am.)
W.A. is switching to Summer Time on Nov 17th just to confuse
everybody again.

From Arthur David Olson (1992-03-08):
The 1992 ending date used in the rules is a best guess;
it matches what was used in the past.

The Australian Bureau of Meteorology FAQ
 (1999-09-27) writes that Giles Meteorological Station uses
South Australian time even though it's located in Western Australia.

Queensland
From George Shepherd via Simon Woodhead via Robert Elz (1991-03-06):
The state of QUEENSLAND.. [Courtesy Qld. Dept Premier Econ&Trade Devel]
[Dec 1990]
...
Zone Australia/Queensland 10:00 AQ %sST
...
Rule AQ 1971 only - Oct lastSun 2:00 1:00 D
Rule AQ 1972 only - Feb lastSun 3:00 0 E
Rule AQ 1989 max - Oct lastSun 2:00 1:00 D
Rule AQ 1990 max - Mar Sun>=1 3:00 0 E

From Bradley White (1989-12-24):
"Australia/Queensland" now observes daylight time (i.e. from
October 1989).

From Bradley White (1991-03-04):
A recent excerpt from an Australian newspaper...
...Queensland...[has] agreed to end daylight saving
at 3am tomorrow (March 3)...

From John Mackin (1991-03-06):
I can certainly confirm for my part that Daylight

Saving in NSW did in fact

end on Sunday, 3 March. I don't know at what hour, though. (It surprised
me.)

From Bradley White (1992-03-08):

...there was recently a referendum in Queensland which resulted
in the experimental daylight saving system being abandoned. So, ...
...

Rule QLD 1989 1991 - Oct lastSun 2:00 1:00 D

Rule QLD 1990 1992 - Mar Sun>=1 3:00 0 S

...

From Arthur David Olson (1992-03-08):

The chosen rules the union of the 1971/1972 change and the 1989-1992 changes.

From Christopher Hunt (2006-11-21), after an advance warning

from Jesper Norgaard Welen (2006-11-01):

WA are trialing DST for three years.

<[http://www.parliament.wa.gov.au/parliament/bills.nsf/9A1B183144403DA54825721200088DF1/\\$File/Bill175-1B.pdf](http://www.parliament.wa.gov.au/parliament/bills.nsf/9A1B183144403DA54825721200088DF1/$File/Bill175-1B.pdf)>

From Rives McDow (2002-04-09):

The most interesting region I have found consists of three towns on the
southern coast.... South Australia observes daylight saving time; Western
Australia does not. The two states are one and
a half hours apart. The

residents decided to forget about this nonsense of changing the clock so
much and set the local time 20 hours and 45 minutes from the
international date line, or right in the middle of the time of South
Australia and Western Australia....

#

From Paul Eggert (2002-04-09):

This is confirmed by the section entitled

"What's the deal with time zones???" in

<<http://www.earthsci.unimelb.edu.au/~awatkins/null.html>>.

#

From Alex Livingston (2006-12-07):

... it was just on four years ago that I drove along the Eyre Highway,
which passes through eastern Western Australia close to the southern
coast of the continent.

#

I paid particular attention to the time kept there. There can be no
dispute that UTC+08:45 was considered "the time" from the border
village just inside the border with South Australia to as far west
as just east of Caiguna. There can also be no dispute that Eucla is
the largest population centre in this zone....

#

Now that

Western Australia is observing daylight saving, the
question arose whether this part of the state would follow suit. I
just called the border village and confirmed that indeed they have,
meaning that they are now observing UTC+09:45.

(2006-12-09):
I personally doubt that either experimentation with daylight saving
in WA or its introduction in SA had anything to do with the genesis
of this time zone. My hunch is that it's been around since well
before 1975. I remember seeing it noted on road maps decades ago.

From Paul Eggert (2006-12-15):
For lack of better info, assume the tradition dates back to the
introduction of standard time in 1895.

southeast Australia

From Paul Eggert (2007-07-23):
Starting autumn 2008 Victoria, NSW, South Australia, Tasmania and the ACT
end DST the first Sunday in April and start DST the first Sunday in October.
<http://www.theage.com.au/news/national/daylight-savings-to-span-six-months/2007/06/27/1182623966703.html>

South Australia

From Bradley White (1991-03-04):
A recent excerpt from an Australian newspaper...
...South Australia...[has] agreed to end daylight saving
at 3am tomorrow (March 3)...

From George Shepherd via Simon Woodhead via Robert Elz (1991-03-06):
The state of SOUTH AUSTRALIA....[Courtesy of S.A. Dept of Labour]
[Nov 1990]
...
Zone Australia/South 9:30 AS %sST
...
Rule AS 1971 max - Oct lastSun 2:00 1:00 D
Rule AS 1972 1985 - Mar Sun>=1 3:00 0 C
Rule AS 1986 1990 - Mar Sun>=15 3:00 0 C
Rule AS 1991 max - Mar Sun>=1 3:00 0 C

From Bradley White (1992-03-11):
Recent correspondence with a friend in Adelaide
contained the following exchange: "Due to the Adelaide Festival,
South Australia delays setting back our clocks for a few weeks."

From Robert Elz (1992-03-13):
I heard that apparently (or at least, it appears that)
South Aus will have an extra 3 weeks daylight saving every even
numbered year (from 1990). That's
when the Adelaide Festival
is on...

From Robert Elz (1992-03-16, 00:57:07 +1000):
DST didn't end in Adelaide today (yesterday)....
But whether it's "4th Sunday" or "2nd last Sunday" I have no idea whatever...
(it's just as likely to be "the Sunday we pick for this year"...).

From Bradley White (1994-04-11):
If Sun, 15 March, 1992 was at +1030 as kre asserts, but yet Sun, 20 March,
1994 was at +0930 as John Connolly's customer seems to assert, then I can
only conclude that the actual rule is more complicated....

From John Warburton (1994-10-07):
The new Daylight Savings dates for South Australia ...
was gazetted in the Government Hansard on Sep 26 1994....
start on last Sunday in October and end in last Sunday in March.

From Paul Eggert (2007-07-23):
See "southeast Australia" above for 2008 and later.

Tasmania

The rules for 1967 through 1991 were reported by George Shepherd
via Simon Woodhead via Robert Elz (1991-03-06):
The state of TASMANIA..
[Courtesy Tasmanian Dept of Premier + Cabinet]
[Nov 1990]

From Bill Hart via Guy Harris (1991-10-10):
Oh yes, the new daylight savings rules are uniquely tasmanian, we have
6 weeks a year now when we are out of sync with the rest of Australia
(but nothing new about that).

From Alex Livingston (1999-10-04):
I heard on the ABC (Australian Broadcasting Corporation) radio news on the
(long) weekend that Tasmania, which usually goes its own way in this regard,
has decided to join with most of NSW, the ACT, and most of Victoria
(Australia) and start daylight saving on the last Sunday in August in 2000
instead of the first Sunday in October.

Sim Alam (2000-07-03) reported a legal citation for the 2000/2001 rules:
<http://www.thelaw.tas.gov.au/fragview/42++1968+GS3A@EN+2000070300>

From Paul Eggert (2007-07-23):
See "southeast Australia" above for 2008 and later.

Victoria

The rules for 1971 through 1991 were reported by George Shepherd
via
Simon Woodhead via Robert Elz (1991-03-06):
The state of VICTORIA.. [Courtesy of Vic. Dept of Premier + Cabinet]
[Nov 1990]

From Scott Harrington (2001-08-29):
On KQED's "City Arts and Lectures" program last night I heard an
interesting story about daylight savings time. Dr. John Heilbron was
discussing his book "The Sun in the Church: Cathedrals as Solar
Observatories"[1], and in particular the Shrine of Remembrance[2] located
in Melbourne, Australia.

Apparently the shrine's main purpose is a beam of sunlight which
illuminates a special spot on the floor at the 11th hour of the 11th day
of the 11th month (Remembrance Day) every year in memory of Australia's
fallen WWI soldiers. And if you go there on Nov. 11, at 11am local time,
you will indeed see the sunbeam illuminate the special spot at the
expected time.

However, that is only because of some special mirror contraption that had
to be employed, since due to daylight savings time,
the true solar time of
the remembrance moment occurs one hour later (or earlier?). Perhaps
someone with more information on this jury-rig can tell us more.

[1] <http://www.hup.harvard.edu/catalog/HEISUN.html>
[2] <http://www.shrine.org.au>

From Paul Eggert (2007-07-23):
See "southeast Australia" above for 2008 and later.

New South Wales

From Arthur David Olson:
New South Wales and subjurisdictions have their own ideas of a fun time.
Based on law library research by John Mackin,
who notes:
In Australia, time is not legislated federally, but rather by the
individual states. Thus, while such terms as "Eastern Standard Time"
[I mean, of course, Australian EST, not any other kind] are in common
use, they have NO REAL MEANING, as they are not defined in the
legislation. This is very important to understand.

I have researched New South Wales time only...

From Eric Ulevik (1999-05-26):

DST will start in NSW on the last Sunday of August, rather than the usual

October in 2000. [See: Matthew Moore,

Two months more daylight saving

Sydney Morning Herald (1999-05-26).]

From Paul Eggert (1999-09-27):

See the following official NSW source:

Daylight Saving in New South Wales.

#

Narrabri Shire (NSW) council has announced it will ignore the extension of

daylight saving next year. See:

Narrabri Council to ignore daylight saving

 (1999-07-22). For now, we'll wait to see if this really happens.

#

Victoria will following NSW. See:

Vic to extend daylight saving

 (1999-07-28).

#

However, South Australia rejected the DST request. See:

#

South Australia rejects Olympics daylight savings request

 (1999-07-19).

#

Queensland also will not observe DST for the Olympics. See:

Qld says no to daylight savings for Olympics

 (1999-06-01), which quotes Queensland Premier Peter Beattie as saying

``Look you've got to remember in my family when this came up last time

I voted for it, my wife voted against it and she said to me it's all very

well for you, you don't have to worry about getting the children out of

bed, getting them to school, getting them to sleep at night.

I've been through all this argument domestically...my wife rules."

#

Broken Hill will stick with South Australian time in 2000. See:

Broken Hill to be behind the times

 (1999-07-21).

IATA SSIM (1998-09) says that
the spring 2000 change for Australian
Capital Territory, New South Wales except Lord Howe Island and Broken
Hill, and Victoria will be August 27, presumably due to the Sydney Olympics.

From Eric Ulevik, referring to Sydney's Sun Herald (2000-08-13), page 29:
The Queensland Premier Peter Beattie is encouraging northern NSW
towns to use Queensland time.

From Paul Eggert (2007-07-23):
See "southeast Australia" above for 2008 and later.

Yancowinna

From John Mackin (1989-01-04):
`Broken Hill' means the County of Yancowinna.

From George Shepherd via Simon Woodhead via Robert Elz (1991-03-06):
YANCOWINNA.. [Confirmation courtesy of Broken Hill Postmaster]
[Dec 1990]
...
Yancowinna uses Central Standard Time, despite [its] location on the
New South Wales side of the S.A. border. Most business and social dealings
are with CST zones, therefore CST is legislated by local government
although the switch to Summer Time occurs in line with
N.S.W. There have
been years when this did not apply, but the historical data is not
presently available.
Zone Australia/Yancowinna 9:30 AY %sST
...
Rule AY 1971 1985 - Oct lastSun 2:00 1:00 D
Rule AY 1972 only - Feb lastSun 3:00 0 C
[followed by other Rules]

Lord Howe Island

From George Shepherd via Simon Woodhead via Robert Elz (1991-03-06):
LHI... [Courtesy of Pauline Van Winsen]
[Dec 1990]
Lord Howe Island is located off the New South Wales coast, and is half an
hour ahead of NSW time.

From James Lonergan, Secretary, Lord Howe Island Board (2000-01-27):
Lord Howe Island summer time in 2000/2001 will commence on the same
date as the rest of NSW (i.e. 2000-08-27). For your information the
Lord Howe Island Board (controlling authority for the Island) is
seeking the community's views on various options for summer time

arrangements on the Island, e.g. advance clocks by 1 full hour
instead of only 30 minutes. [Dependent] on
the wishes of residents
the Board may approach the NSW government to change the existing
arrangements. The starting date for summer time on the Island will
however always coincide with the rest of NSW.

From James Lonergan, Secretary, Lord Howe Island Board (2000-10-25):
Lord Howe Island advances clocks by 30 minutes during DST in NSW and retards
clocks by 30 minutes when DST finishes. Since DST was most recently
introduced in NSW, the "changeover" time on the Island has been 02:00 as
shown on clocks on LHI. I guess this means that for 30 minutes at the start
of DST, LHI is actually 1 hour ahead of the rest of NSW.

From Paul Eggert (2006-03-22):
For Lord Howe dates we use Shanks & Pottenger through 1989, and
Lonergan thereafter. For times we use Lonergan.

From Paul Eggert (2007-07-23):
See "southeast Australia" above for 2008 and later.

From Steffen Thorsen (2009-04-28):
According to the official press release, South Australia's extended daylight

saving period will continue with the same rules as used during the 2008-2009
summer (southern hemisphere).

From

http://www.safework.sa.gov.au/uploaded_files/DaylightDatesSet.pdf

The extended daylight saving period that South Australia has been trialling
for over the last year is now set to be ongoing.
Daylight saving will continue to start on the first Sunday in October each
year and finish on the first Sunday in April the following year.
Industrial Relations Minister, Paul Caica, says this provides South Australia
with a consistent half hour time difference with NSW, Victoria, Tasmania and
the ACT for all 52 weeks of the year...

We have a wrap-up here:

http://www.timeanddate.com/news/time/south-australia-extends-dst.html

#####

New Zealand

```

# From Mark Davies (1990-10-03):
# the 1989/90 year was a trial of an extended "daylight saving" period.
# This trial was deemed successful and the extended period adopted for
# subsequent years (with the addition of a further week at the start).
# source -- phone call to Ministry of Internal Affairs Head Office.

# From George Shepherd via Simon Woodhead via Robert Elz (1991-03-06):
## The Country of New Zealand (Australia's east island -) Gee they hate that!
## or is Australia the west island of N.Z.
## [ courtesy of Geoff Tribble.. Auckland N.Z. ]
## [ Nov 1990 ]
# ...
# Rule NZ 1974 1988 - Oct lastSun 2:00 1:00 D
# Rule NZ 1989 max - Oct Sun>=1 2:00 1:00 D
# Rule NZ 1975 1989 - Mar Sun>=1 3:00 0 S
# Rule NZ 1990 max - Mar lastSun 3:00 0 S
# ...
# Zone NZ 12:00 NZ NZ%ST # New Zealand
# Zone NZ-CHAT 12:45 - NZ-CHAT # Chatham Island

# From Arthur David Olson (1992-03-08):
# The chosen rules use the Davies October 8
# values for the start of DST in 1989
# rather than the October 1 value.

# From Paul Eggert (1995-12-19);
# Shank & Pottenger report 2:00 for all autumn changes in Australia and NZ.
# Robert Uzgalis writes that the New Zealand Daylight
# Savings Time Order in Council dated 1990-06-18 specifies 2:00 standard
# time on both the first Sunday in October and the third Sunday in March.
# As with Australia, we'll assume the tradition is 2:00s, not 2:00.
#
# From Paul Eggert (2006-03-22):
# The Department of Internal Affairs (DIA) maintains a brief history,
# as does Carol Squires; see tz-link.htm for the full references.
# Use these sources in preference to Shanks & Pottenger.
#
# For Chatham, IATA SSIM (1991/1999) gives the NZ rules but with
# transitions at 2:45 local standard time; this confirms that Chatham
# is always exactly 45 minutes ahead of Auckland.

# From Colin Sharples (2007-04-30):
# DST will now start on the last Sunday in September, and end on the
# first Sunday in April. The
# changes take effect this year, meaning
# that DST will begin on 2007-09-30 2008-04-06.
# http://www.dia.govt.nz/diawebsite.nsf/wpg_URL/Services-Daylight-Saving-Daylight-saving-to-be-extended

```


#####

Fiji

Howse writes (p 153) that in 1879 the British governor of Fiji
enacted an ordinance standardizing the islands on Antipodean Time
instead of the American system (which was one day behind).

From Rives McDow (1998-10-08):
Fiji will introduce DST effective 0200 local time, 1998-11-01
until 0300 local time 1999-02-28. Each year the DST period will
be from the first Sunday in November until the last Sunday in February.

From Paul Eggert (2000-01-08):
IATA SSIM (1999-09) says DST ends 0100 local time. Go with McDow.

From the BBC World Service (1998-10-31 11:32 UTC):
The Fijian government says the main reasons for the time change is to
improve productivity and reduce road accidents. But
correspondents say it
also hopes the move will boost Fiji's ability to compete with other pacific
islands in the effort to attract tourists to witness the dawning of the new
millenium.

http://www.fiji.gov.fj/press/2000_09/2000_09_13-05.shtml (2000-09-13)
reports that Fiji has discontinued DST.

Johnston

Johnston data is from usno1995.

Kiribati

From Paul Eggert (1996-01-22):
Today's *Wall Street Journal* (page 1) reports that Kiribati
``declared it the same day [throughout] the country as of Jan. 1, 1995"
as part of the competition to be first into the 21st century.

Kwajalein

In *comp.risks* 14.87 (26 August 1993), Peter Neumann writes:
I wonder what happened in Kwajalein, where there was NO Friday,
1993-08-20. Thursday night at midnight Kwajalein switched sides with
respect to the International Date Line, to rejoin its fellow islands,
going from 11:59 p.m. Thursday to 12:00 m. Saturday in a blink.

N Mariana Is, Guam

Howse writes (p 153)

``The Spaniards, on the other hand, reached the

Philippines and the Ladrones from America," and implies that the Ladrones

(now called the Marianas) kept American date for quite some time.

For now, we assume the Ladrones switched at the same time as the Philippines;

see Asia/Manila.

US Public Law 106-564 (2000-12-23) made UTC+10 the official standard time,

under the name "Chamorro Standard Time". There is no official abbreviation,

but Congressman Robert A. Underwood, author of the bill that became law,

wrote in a press release (2000-12-27) that he will seek the use of "ChST".

Micronesia

Alan Eugene Davis writes (1996-03-16),

``I am certain, having lived there for the past decade, that "Truk"

(now properly known as Chuuk) ... is in the time zone GMT+10."

#

Shanks & Pottenger write that Truk switched from UTC+10 to UTC+11

on 1978-10-01; ignore this for now.

From Paul Eggert (1999-10-29):

The Federated States of Micronesia Visitors Board writes in

#

The Federated States of Micronesia - Visitor Information

 (1999-01-26)

that Truk and Yap are UTC+10, and Ponape and Kosrae are UTC+11.

We don't know when Kosrae switched from UTC+12; assume January 1 for now.

Midway

From Charles T O'Connor, KMTH DJ (1956),

quoted in the KTMH section of the Radio Heritage Collection

<http://radiodx.com/spdxr/KMTH.htm> (2002-12-31):

For the past two months we've been on what is known as Daylight

Saving Time. This time has put us on air at 5am in the morning,

your time down there in New Zealand. Starting September 2, 1956

we'll again go back to Standard Time. This'll mean that we'll go to

air at 6am your time.

#

From Paul Eggert (2003-03-23):

We don't know the date of that quote, but we'll guess they
started DST on June 3. Possibly DST was observed other years
in Midway, but we have no record of it.

Pitcairn

From Rives McDow (1999-11-08):

A Proclamation

was signed by the Governor of Pitcairn on the 27th March 1998

with regard to Pitcairn Standard Time. The Proclamation is as follows.

#

The local time for general purposes in the Islands shall be

Co-ordinated Universal time minus 8 hours and shall be known

as Pitcairn Standard Time.

#

... I have also seen Pitcairn listed as UTC minus 9 hours in several

references, and can only assume that this was an error in interpretation

somehow in light of this proclamation.

From Rives McDow (1999-11-09):

The Proclamation regarding Pitcairn time came into effect on 27 April 1998

... at midnight.

From Howie Phelps (1999-11-10), who talked to a Pitcairner via shortwave:

Betty Christian told me yesterday that their local time is the same as

Pacific Standard Time. They used to be 1/2 hour different from us here in

Sacramento but it was changed a couple of years ago.

Samoa

Howse writes (p 153, citing p 10 of the 1883-11-18 New York Herald)

that in 1879 the King

of Samoa decided to change

``the date in his kingdom from the Antipodean to the American system,

ordaining -- by a masterpiece of diplomatic flattery -- that

the Fourth of July should be celebrated twice in that year."

Tonga

From Paul Eggert (1996-01-22):

Today's Wall Street Journal (p 1) reports that ``Tonga has been plotting

to sneak ahead of [New Zealanders] by introducing daylight-saving time."

Since Kiribati has moved the Date Line it's not clear what Tonga will do.

Don Mundell writes in the 1997-02-20 Tonga Chronicle

How Tonga became 'The Land where Time Begins'

:

Until 1941 Tonga maintained a standard time 50 minutes ahead of NZST
12 hours and 20 minutes ahead of GMT. When New Zealand adjusted its
standard time in 1940s, Tonga had the choice of subtracting from its
local time to come on the same standard time as New Zealand or of
advancing its time to maintain the
differential of 13 degrees
(approximately 50 minutes ahead of New Zealand time).

#

Because His Majesty King Taufa'ahau Tupou IV, then Crown Prince
Tungi, preferred to ensure Tonga's title as the land where time
begins, the Legislative Assembly approved the latter change.

#

But some of the older, more conservative members from the outer
islands objected. "If at midnight on Dec. 31, we move ahead 40
minutes, as your Royal Highness wishes, what becomes of the 40
minutes we have lost?"

#

The Crown Prince, presented an unanswerable argument: "Remember that
on the World Day of Prayer, you would be the first people on Earth
to say your prayers in the morning."

From Paul Eggert (2006-03-22):

Shanks & Pottenger say the transition was on 1968-10-01; go with Mundell.

From Eric Ulevik (1999-05-03):

Tonga's director of tourism, who is also secretary of the National Millennium
Committee, has a plan to get Tonga back in front.
He has proposed a one-off move to tropical
daylight saving for Tonga from
October to March, which has won approval in principle from the Tongan
Government.

From Steffen Thorsen (1999-09-09):

* Tonga will introduce DST in November

#

I was given this link by John Letts:

http://news.bbc.co.uk/hi/english/world/asia-pacific/newsid_424000/424764.stm

#

I have not been able to find exact dates for the transition in November
yet. By reading this article it seems like Fiji will be 14 hours ahead
of UTC as well, but as far as I know Fiji will only be 13 hours ahead
(12 + 1 hour DST).

From Arthur David Olson (1999-09-20):
According to
http://www.tongaonline.com/news/sept1799.html
:

"Daylight Savings Time will take effect on Oct. 2 through April 15, 2000
and annually thereafter from the first Saturday in October through the
third Saturday of April.

Under the system approved by Privy Council on
Sept. 10, clocks must be turned ahead one hour on the opening day and
set back an hour on the closing date."
Alas, no indication of the time of day.

From Rives McDow (1999-10-06):
Tonga started its Daylight Saving on Saturday morning October 2nd at 0200am.
Daylight Saving ends on April 16 at 0300am which is Sunday morning.

From Steffen Thorsen (2000-10-31):
Back in March I found a notice on the website <http://www.tongaonline.com>
that Tonga changed back to standard time one month early, on March 19
instead of the original reported date April 16. Unfortunately, the article
is no longer available on the site, and I did not make a copy of the
text, and I have forgotten to report it here.
(Original URL was: <http://www.tongaonline.com/news/march162000.htm>)

From Rives McDow (2000-12-01):
Tonga is observing DST as of 2000-11-04 and will stop on 2001-01-27.

From Sione Moala-Mafi (2001-09-20) via Rives McDow:

At 2:00am on the first Sunday of November, the standard time in the Kingdom
shall be moved forward by one hour to 3:00am. At 2:00am on the last Sunday
of January the standard time in the Kingdom shall be moved backward by one
hour to 1:00am.

From Pulu 'Anau (2002-11-05):
The law was for 3 years, supposedly to get renewed. It wasn't.

Wake

From Vernice Anderson, Personal Secretary to Philip Jessup,
US Ambassador At Large (oral history interview, 1971-02-02):

Saturday, the 14th [of October, 1950] -- ... The time was all the
more confusing at that point, because we had crossed the
International Date Line, thus getting two Sundays. Furthermore, we
discovered that Wake Island had two hours of daylight saving time

making calculation of time in Washington difficult if not almost
impossible.

<http://www.trumanlibrary.org/wake/meeting.htm>

From Paul Eggert (2003-03-23):
We have no other report of DST in Wake Island, so omit this info for now.

#####

The International Date Line

From Gwillim Law (2000-01-03):

The International Date Line is not defined by any international standard,
convention, or treaty. Mapmakers are free to draw it as they please.
Reputable mapmakers will simply ensure that every point of land appears on
the correct side of the IDL, according to the date legally observed there.

When Kiribati adopted a uniform date in 1995, thereby moving the Phoenix and
Line Islands to the west side of the IDL (or, if you prefer, moving the IDL
to the east side of the Phoenix and Line Islands), I suppose that most
mapmakers redrew the IDL following the boundary of Kiribati. Even that line
has a rather arbitrary nature. The straight-line boundaries between Pacific
island nations that are shown on many maps are based on an international
convention, but are not legally binding national borders.... The date is
governed by
the IDL; therefore, even on the high seas, there may be some
places as late as fourteen hours later than UTC. And, since the IDL is not
an international standard, there are some places on the high seas where the
correct date is ambiguous.

From Wikipedia <http://en.wikipedia.org/wiki/Time_zone> (2005-08-31):
Before 1920, all ships kept local apparent time on the high seas by setting
their clocks at night or at the morning sight so that, given the ship's
speed and direction, it would be 12 o'clock when the Sun crossed the ship's
meridian (12 o'clock = local apparent noon). During 1917, at the
Anglo-French Conference on Time-keeping at Sea, it was recommended that all
ships, both military and civilian, should adopt hourly standard time zones
on the high seas. Whenever a ship was within the territorial waters of any
nation it would use that nation's standard time. The captain was permitted
to change his ship's clocks at a time of his choice following his ship's

entry into another zone time--he often chose midnight. These zones were
adopted by all major fleets between 1920 and 1925 but not by many
independent merchant ships until World War II.

```
# From Paul Eggert, using references suggested by Oscar van Vlijmen
# (2005-03-20):
#
# The American Practical Navigator (2002)
# <http://pollux.nss.nima.mil/pubs/pubs_j_apn_sections.html?rid=187>
# talks only about the 180-degree meridian with respect to ships in
# international waters; it ignores the international date line.
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/australasia
```

No license file was found, but licenses were detected in source scan.

```
#
# Copyright 2000-2005 Sun Microsystems, Inc. All Rights Reserved.
# DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
#
# This code is free software; you can redistribute it and/or modify it
# under the terms of the GNU General Public License version 2 only, as
# published by the Free Software Foundation. Sun designates this
# particular file as subject to the "Classpath" exception as provided
# by Sun in the LICENSE file that accompanied this code.
#
# This code is distributed in the hope that it will be useful, but WITHOUT
# ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
# FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
# version 2 for more details (a copy is included in the LICENSE file that
# accompanied this code).
#
# You should have received a copy of the GNU General Public License version
# 2 along with this work; if not, write to the Free Software
# Foundation,
# Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
#
# Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
# CA 95054 USA or visit www.sun.com if you need additional information or
# have any questions.
#
```

```
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone GMT 0:00 - GMT
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/tzdata_jdk/gmt
```

No license file was found, but licenses were detected in source scan.

```
# <pre>
```

This file is in the public domain, so clarified as of
2009-05-17 by Arthur David Olson.

This data is by no means authoritative; if you think you know better,
go ahead and edit the file (and please send any changes to
tz@iana.org for general use in the future).

From Paul Eggert (2006-03-22):
A good source for time zone historical data outside the U.S. is
Thomas G. Shanks and Rique Pottenger, The International Atlas (6th edition),
San Diego: ACS Publications, Inc. (2003).

For data circa 1899, a common source is:
Milne J. Civil time. Geogr J. 1899 Feb;13(2):173-94
<<http://www.jstor.org/stable/1774359>>.

Gwillim Law writes that a good source
for recent time zone data is the International Air Transport
Association's Standard Schedules Information Manual (IATA SSIM),
published semiannually. Law sent in several helpful summaries
of the IATA's data after 1990.

Except where
otherwise noted, Shanks & Pottenger is the source for
entries through 1990, and IATA SSIM is the source for entries afterwards.

Earlier editions of these tables used the North American style (e.g. ARST and
ARDT for Argentine Standard and Daylight Time), but the following quote
suggests that it's better to use European style (e.g. ART and ARST).
I suggest the use of `_Summer time_` instead of the more cumbersome
`_daylight-saving time_`. `_Summer time_` seems to be in general use
in Europe and South America.
-- E O Cutler, `_New York Times_` (1937-02-14), quoted in
H L Mencken, `_The American Language: Supplement I_` (1960), p 466

Earlier editions of these tables also used the North American style
for time zones in Brazil, but this was incorrect, as Brazilians say
"summer time". Reinaldo Goulart, a Sao Paulo businessman active in
the railroad sector, writes (1999-07-06):
The subject of time zones is currently a matter of discussion/debate in
Brazil. Let's say
that "the Brasilia time" is considered the
"official time" because Brasilia is the capital city.
The other three time zones are called "Brasilia time "minus one" or
"plus one" or "plus two". As far as I know there is no such
name/designation as "Eastern Time" or "Central Time".
So I invented the following (English-language) abbreviations for now.
Corrections are welcome!


```
# std dst
# -2:00 FNT FNST Fernando de Noronha
# -3:00 BRT BRST Brasilia
# -4:00 AMT AMST Amazon
# -5:00 ACT ACST Acre
```

```
#####
```

```
#####
```

```
# Argentina
```

```
# From Bob Devine (1988-01-28):
# Argentina: first Sunday in October to first Sunday in April since 1976.
# Double Summer time from 1969 to 1974. Switches at midnight.
```

```
# From U. S. Naval Observatory (1988-01-199):
# ARGENTINA      3 H BEHIND  UTC
```

```
# From Hernan G. Otero (1995-06-26):
# I am sending modifications
# to the Argentine time zone table...
# AR was chosen because they are the ISO letters that represent Argentina.
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
```

```
Rule Arg 1930 only - Dec 1 0:00 1:00 S
Rule Arg 1931 only - Apr 1 0:00 0 -
Rule Arg 1931 only - Oct 15 0:00 1:00 S
Rule Arg 1932 1940 - Mar 1 0:00 0 -
Rule Arg 1932 1939 - Nov 1 0:00 1:00 S
Rule Arg 1940 only - Jul 1 0:00 1:00 S
Rule Arg 1941 only - Jun 15 0:00 0 -
Rule Arg 1941 only - Oct 15 0:00 1:00 S
Rule Arg 1943 only - Aug 1 0:00 0 -
Rule Arg 1943 only - Oct 15 0:00 1:00 S
Rule Arg 1946 only - Mar 1 0:00 0 -
Rule Arg 1946 only - Oct 1 0:00 1:00 S
Rule Arg 1963 only - Oct 1 0:00 0 -
Rule Arg 1963 only - Dec 15 0:00 1:00 S
Rule Arg 1964 1966 - Mar 1 0:00 0 -
Rule Arg 1964 1966 - Oct 15 0:00 1:00 S
Rule Arg 1967 only - Apr 2 0:00 0 -
Rule Arg 1967 1968 - Oct Sun>=1 0:00 1:00 S
Rule Arg 1968 1969 - Apr Sun>=1 0:00 0 -
Rule Arg 1974 only - Jan 23 0:00 1:00 S
Rule Arg 1974 only - May 1 0:00 0 -
Rule Arg 1988 only - Dec
```

1 0:00 1:00 S

#

From Hernan G. Otero (1995-06-26):

These corrections were contributed by InterSoft Argentina S.A.,
obtaining the data from the:

Talleres de Hidrografia Naval Argentina
(Argentine Naval Hydrography Institute)

Rule Arg 1989 1993 - Mar Sun>=1 0:00 0 -

Rule Arg 1989 1992 - Oct Sun>=15 0:00 1:00 S

#

From Hernan G. Otero (1995-06-26):

From this moment on, the law that mandated the daylight saving
time corrections was derogated and no more modifications
to the time zones (for daylight saving) are now made.

#

From Rives McDow (2000-01-10):

On October 3, 1999, 0:00 local, Argentina implemented daylight savings time,
which did not result in the switch of a time zone, as they stayed 9 hours
from the International Date Line.

Rule Arg 1999 only - Oct Sun>=1 0:00 1:00 S

From Paul Eggert (2007-12-28):

DST was set to expire on March 5, not March 3, but since it was converted
to standard time on March 3 it's more convenient for us to pretend that

#

it ended on March 3.

Rule Arg 2000 only - Mar 3 0:00 0 -

#

From Peter Gradelski via Steffen Thorsen (2000-03-01):

We just checked with our Sao Paulo office and they say the government of
Argentina decided not to become one of the countries that go on or off DST.
So Buenos Aires should be -3 hours from GMT at all times.

#

From Fabian L. Arce Jofre (2000-04-04):

The law that claimed DST for Argentina was derogated by President Fernando
de la Rúa on March 2, 2000, because it would make people spend more energy
in the winter time, rather than less. The change took effect on March 3.

#

From Mariano Absatz (2001-06-06):

one of the major newspapers here in Argentina said that the 1999
Timezone Law (which never was effectively applied) will (would?) be
in effect.... The article is at

<http://ar.clarin.com/diario/2001-06-06/e-01701.htm>

... The Law itself is "Ley No 25155", sanctioned on 1999-08-25, enacted

1999-09-17, and published 1999-09-21. The official publication

is at:

<http://www.boletin.jus.gov.ar/BON/Primera/1999/09-Septiembre/21/PDF/BO21-09-99LEG.PDF>

Regretfully, you have to subscribe (and pay) for the on-line version....

#

(2001-06-12):
the timezone for Argentina will not change next Sunday.
Apparently it will do so on Sunday 24th....
<http://ar.clarin.com/diario/2001-06-12/s-03501.htm>
#

(2001-06-25):
Last Friday (yes, the last working day before the date of the change), the
Senate annulled the 1999 law that introduced the changes later postponed.
<http://www.clarin.com.ar/diario/2001-06-22/s-03601.htm>
It remains the vote of the Deputies..., but it will be the same....
This kind of things had always been done this way in Argentina.
We are still -03:00 all year round in all of the country.
#

From Steffen Thorsen (2007-12-21):
A user (Leonardo Chaim) reported that Argentina will adopt DST....
all of the country (all Zone-entries) are affected. News reports like
http://www.lanacion.com.ar/opinion/nota.asp?nota_id=973037
indicate
that Argentina will use DST next year as well, from October to
March, although exact rules are not given.
#

From Jesper Norgaard Welen (2007-12-26)
The last hurdle of Argentina DST is over, the proposal was approved in
the lower chamber too (Deputados) with a vote 192 for and 2 against.
By the way thanks to Mariano Absatz and Daniel Mario Vega for the link to
the original scanned proposal, where the dates and the zero hours are
clear and unambiguous...This is the article about final approval:
http://www.lanacion.com.ar/politica/nota.asp?nota_id=973996
http://www.lanacion.com.ar/politica/nota.asp?nota_id=973996
[http://www.lanacion.com.ar/politica/nota.asp?nota_id=973996](#)
#

From Paul Eggert (2007-12-22):
For dates after mid-2008, the following rules are my guesses and
are quite possibly wrong, but are more likely than no DST at all.

From Alexander Krivenyshev (2008-09-05):
As per message from Carlos Alberto Fonseca Arauz (Nicaragua),
Argentina will start DST on Sunday October
19, 2008.
#

http://www.worldtimezone.com/dst_news/dst_news_argentina03.html
http://www.worldtimezone.com/dst_news/dst_news_argentina03.html
#

OR
<http://www.impulsobaires.com.ar/nota.php?id=57832> (in spanish)
<http://www.impulsobaires.com.ar/nota.php?id=57832> (in spanish)
#

```
# From Rodrigo Severo (2008-10-06):
# Here is some info available at a Gentoo bug related to TZ on Argentina's DST:
# ...
# ----- Comment #1 from [jmdocile] 2008-10-06 16:28 0000 -----
# Hi, there is a problem with timezone-data-2008e and maybe with
# timezone-data-2008f
# Argentinian law [Number] 25.155 is no longer valid.
# <a href="http://www.infoleg.gov.ar/infolegInternet/anexos/60000-64999/60036/norma.htm">
# http://www.infoleg.gov.ar/infolegInternet/anexos/60000-64999/60036/norma.htm
# </a>
# The new one is law [Number] 26.350
# <a href="http://www.infoleg.gov.ar/infolegInternet/anexos/135000-139999/136191/norma.htm">
# http://www.infoleg.gov.ar/infolegInternet/anexos/135000-139999/136191/norma.htm
#
# </a>
# So there is no summer time in Argentina for now.

# From Mariano Absatz (2008-10-20):
# Decree 1693/2008 applies Law 26.350 for the summer 2008/2009 establishing DST in Argentina
# From 2008-10-19 until 2009-03-15
# <a
href="http://www.boletinoficial.gov.ar/Bora.Portal/CustomControls/PdfContent.aspx?fp=16102008&pi=3&pf=4&s
=0&sec=01">
#
http://www.boletinoficial.gov.ar/Bora.Portal/CustomControls/PdfContent.aspx?fp=16102008&pi=3&pf=4&s=0&se
c=01
# </a>
#
# Decree 1705/2008 excepting 12 Provinces from applying DST in the summer 2008/2009:
# Catamarca, La Rioja, Mendoza, Salta, San Juan, San Luis, La Pampa, Neuquen, Rio Negro, Chubut, Santa Cruz
# and Tierra del Fuego
# <a
href="http://www.boletinoficial.gov.ar/Bora.Portal/CustomControls/PdfContent.aspx?fp=17102008&pi=1&pf=1&s
=0&sec=01">
#
http://www.boletinoficial.gov.ar/Bora.Portal/CustomControls/PdfContent.aspx?fp=17102008&pi=1&pf=1&s=0&se
c=01
# </a>
#
# Press release 235 dated Saturday
October 18th, from the Government of the Province of Jujuy saying
# it will not apply DST either (even when it was not included in Decree 1705/2008)
# <a href="http://www.jujuy.gov.ar/index2/partes_prensa/18_10_08/235-181008.doc">
# http://www.jujuy.gov.ar/index2/partes_prensa/18_10_08/235-181008.doc
# </a>

# From fullinet (2009-10-18):
# As announced in
```

```
# <a href="http://www.argentina.gob.ar/argentina/portal/paginas.dhtml?pagina=356">
# http://www.argentina.gob.ar/argentina/portal/paginas.dhtml?pagina=356
# </a>
# (an official .gob.ar) under title: "Sin Cambio de Hora" (english: "No hour change")
#
# "Por el momento, el Gobierno Nacional resolvio no modificar la hora
# oficial, decision que estaba en estudio para su implementacion el
# domingo 18 de octubre. Desde el Ministerio de Planificacion se anuncio
# que la Argentina hoy, en estas condiciones meteorologicas, no necesita
# la modificacion del huso horario, ya que 2009 nos encuentra con
# crecimiento en la produccion y distribucion
# energetica."
```

Rule Arg 2007 only - Dec 30 0:00 1:00 S

Rule Arg 2008 2009 - Mar Sun>=15 0:00 0 -

Rule Arg 2008 only - Oct Sun>=15 0:00 1:00 S

```
# From Mariano Absatz (2004-05-21):
```

```
# Today it was officially published that the Province of Mendoza is changing
# its timezone this winter... starting tomorrow night....
```

```
# http://www.gobernac.mendoza.gov.ar/boletin/pdf/20040521-27158-normas.pdf
```

```
# From Paul Eggert (2004-05-24):
```

```
# It's Law No. 7,210. This change is due to a public power emergency, so for
# now we'll assume it's for this year only.
```

```
#
```

```
# From Paul Eggert (2006-03-22):
```

```
# <a href="http://www.spicasc.net/horvera.html">
```

```
# Hora de verano para la Republica Argentina (2003-06-08)
```

```
# </a> says that standard time in Argentina from 1894-10-31
```

```
# to 1920-05-01 was -4:16:48.25. Go with this more-precise value
```

```
# over Shanks & Pottenger.
```

```
#
```

```
# From Mariano Absatz (2004-06-05):
```

```
# These media articles from a major newspaper mostly cover the current state:
```

```
# http://www.lanacion.com.ar/04/05/27/de_604825.asp
```

```
#
```

```
http://www.lanacion.com.ar/04/05/28/de_605203.asp
```

```
#
```

```
# The following eight (8) provinces pulled clocks back to UTC-04:00 at
```

```
# midnight Monday May 31st. (that is, the night between 05/31 and 06/01).
```

```
# Apparently, all nine provinces would go back to UTC-03:00 at the same
```

```
# time in October 17th.
```

```
#
```

```
# Catamarca, Chubut, La Rioja, San Juan, San Luis, Santa Cruz,
```

```
# Tierra del Fuego, Tucuman.
```

```
#
```

```
# From Mariano Absatz (2004-06-14):
```

```
# ... this weekend, the Province of Tucuman decided it'd go back to UTC-03:00
```

yesterday midnight (that is, at 24:00 Saturday 12th), since the people's
annoyance with the change is much higher than the power savings obtained....

From Gwillim Law (2004-06-14):
http://www.lanacion.com.ar/04/06/10/de_609078.asp ...
"The time change in Tierra del Fuego was a conflicted decision from
the start. The government had decreed that the measure would take
effect on June 1, but a normative error forced the new time to begin
three days earlier,
from a Saturday to a Sunday....
Our understanding was that the change was originally scheduled to take place
on June 1 at 00:00 in Chubut, Santa Cruz, Tierra del Fuego (and some other
provinces). Sunday was May 30, only two days earlier. So the article
contains a contradiction. I would give more credence to the Saturday/Sunday
date than the "three days earlier" phrase, and conclude that Tierra del
Fuego set its clocks back at 2004-05-30 00:00.

From Steffen Thorsen (2004-10-05):
The previous law 7210 which changed the province of Mendoza's time zone
back in May have been modified slightly in a new law 7277, which set the
new end date to 2004-09-26 (original date was 2004-10-17).
<http://www.gobernac.mendoza.gov.ar/boletin/pdf/20040924-27244-normas.pdf>

From Mariano Absatz (2004-10-05):
San Juan changed from UTC-03:00 to UTC-04:00 at midnight between
Sunday, May 30th and Monday, May 31st. It changed back to UTC-03:00
at midnight between Saturday, July
24th and Sunday, July 25th....
<http://www.sanjuan.gov.ar/prensa/archivo/000329.html>
<http://www.sanjuan.gov.ar/prensa/archivo/000426.html>
<http://www.sanjuan.gov.ar/prensa/archivo/000441.html>

From Alex Krivenyshev (2008-01-17):
Here are articles that Argentina Province San Luis is planning to end DST
as earlier as upcoming Monday January 21, 2008 or February 2008:

Provincia argentina retrasa reloj y marca diferencia con resto del pais
(Argentine Province delayed clock and mark difference with the rest of the
country)
http://cl.invertia.com/noticias/noticia.aspx?idNoticia=200801171849_EFE_ET4373&idtel>
http://cl.invertia.com/noticias/noticia.aspx?idNoticia=200801171849_EFE_ET4373&idtel

Es inminente que en San Luis atrasen una hora los relojes
(It is imminent in San Luis clocks one hour delay)
http://www.lagaceta.com.ar/vernotae.asp?id_nota=253414>
http://www.lagaceta.com.ar/vernotae.asp?id_nota=253414


```
#  
# <a href="http://www.worldtimezone.net/dst_news/dst_news_argentina02.html">  
#  
# http://www.worldtimezone.net/dst_news/dst_news_argentina02.html  
# </a>
```

```
# From Jesper Norgaard Welen (2008-01-18):  
# The page of the San Luis provincial government  
# <a href="http://www.sanluis.gov.ar/notas.asp?idCanal=0&id=22812">  
# http://www.sanluis.gov.ar/notas.asp?idCanal=0&id=22812  
# </a>  
# confirms what Alex Krivenyshev has earlier sent to the tz  
# emailing list about that San Luis plans to return to standard  
# time much earlier than the rest of the country. It also  
# confirms that upon request the provinces San Juan and Mendoza  
# refused to follow San Luis in this change.  
#  
# The change is supposed to take place Monday the 21.st at 0:00  
# hours. As far as I understand it if this goes ahead, we need  
# a new timezone for San Luis (although there are also documented  
# independent changes in the southamerica file of San Luis in  
# 1990 and 1991 which has not been confirmed).
```

```
# From Jesper Norgaard Welen (2008-01-25):  
#  
# Unfortunately the below page has become defunct, about the San Luis  
# time change. Perhaps because it now is part of a group of pages "Most  
# important pages of 2008."  
#  
# You can use  
# <a href="http://www.sanluis.gov.ar/notas.asp?idCanal=8141&id=22834">  
# http://www.sanluis.gov.ar/notas.asp?idCanal=8141&id=22834  
# </a>  
# instead it seems. Or use "Buscador" from the main page of the San Luis  
# government, and fill in "huso" and click OK, and you will get 3 pages  
# from which the first one is identical to the above.
```

```
# From Mariano Absatz (2008-01-28):  
# I can confirm that the Province of San Luis (and so far only that  
# province) decided to go back to UTC-3 effective midnight Jan 20th 2008  
# (that is, Monday 21st at 0:00 is the time the clocks were delayed back  
# 1 hour), and they intend to keep UTC-3 as their timezone all year round  
# (that is, unless they change their mind any minute now).  
#  
# So we'll have to add yet another city to 'southamerica' (I think San  
# Luis city is the mos  
# populated city in the Province, so it'd be  
# America/Argentina/San_Luis... of course I can't remember if San Luis's
```

history of particular changes goes along with Mendoza or San Juan :-(
(I only remember not being able to collect hard facts about San Luis
back in 2004, when these provinces changed to UTC-4 for a few days, I
mailed them personally and never got an answer).

From Paul Eggert (2008-06-30):
Unless otherwise specified, data are from Shanks & Pottenger through 1992,
from the IATA otherwise. As noted below, Shanks & Pottenger say that
America/Cordoba split into 6 subregions during 1991/1992, one of which
was America/San_Luis, but we haven't verified this yet so for now we'll
keep America/Cordoba a single region rather than splitting it into the
other 5 subregions.

From Mariano Absatz (2009-03-13):
Yesterday (with our usual 2-day notice) the Province of San Luis
decided that next Sunday instead of "staying" @utc-03:00 they will go
to utc-04:00 until
the second Saturday in October...

The press release is at

http://www.sanluis.gov.ar/SL/Paginas/NoticiaDetalle.asp?TemaId=1&InfoPrensaId=3102

(I couldn't find the decree, but

www.sanluis.gov.ar
<a/>
is the official page for the Province Government).

There's also a note in only one of the major national papers ...
http://www.lanacion.com.ar/nota.asp?nota_id=1107912

The press release says [quick and dirty translation]:
... announced that next Sunday, at 00:00, Puntanos (the San Luis
inhabitants) will have to turn back one hour their clocks

Since then, San Luis will establish its own Province timezone. Thus,
during 2009, this timezone change will run from 00:00 the third Sunday
in March until 24:00 of the second Saturday in October.

From Mariano Absatz (2009-10-16):
...the Province of San Luis is a case in
itself.

The Law at

http://www.diputadosanluis.gov.ar/diputadosasp/paginas/verNorma.asp?NormaID=276

is ambiguous because establishes a calendar from the 2nd Sunday in
October at 0:00 thru the 2nd Saturday in March at 24:00 and the
complement of that starting on the 2nd Sunday of March at 0:00 and
ending on the 2nd Saturday of March at 24:00.

This clearly breaks every time the 1st of March or October is a Sunday.

IMHO, the "spirit of the Law" is to make the changes at 0:00 on the 2nd
Sunday of October and March.

The problem is that the changes in the rest of the Provinces that did
change in 2007/2008, were made according to the Federal Law and Decrees
that did so on the 3rd Sunday of October and March.

In fact, San Luis actually switched from UTC-4 to UTC-3 last Sunday
(October 11th) at 0:00.

So I guess a new set of rules, besides "Arg", must be
made and the last
America/Argentina/San_Luis entries should change to use these...

I'm enclosing a patch that does what I say... regretfully, the San Luis
timezone must be called "WART/WARST" even when most of the time (like,
right now) WARST == ART... that is, since last Sunday, all the country
is using UTC-3, but in my patch, San Luis calls it "WARST" and the rest
of the country calls it "ART".
...

From Alexander Krivenyshev (2010-04-09):
According to news reports from El Diario de la Republica Province San
Luis, Argentina (standard time UTC-04) will keep Daylight Saving Time
after April 11, 2010--will continue to have same time as rest of
Argentina (UTC-3) (no DST).

Confirmaron la prórroga del huso horario de verano (Spanish)

http://www.eldiariodelarepublica.com/index.php?option=com_content&task=view&id=29383&Itemid=9

or (some
English translation):

http://www.worldtimezone.com/dst_news/dst_news_argentina08.html

From Mariano Absatz (2010-04-12):
yes...I can confirm this...and given that San Luis keeps calling
UTC-03:00 "summer time", we shouldn't just let San Luis go back to "Arg"

rules...San Luis is still using "Western ARgentina Time" and it got
stuck on Summer daylight savings time even though the summer is over.

From Paul Eggert (2013-02-21):

Milne says Cordoba time was -4:16:48.2. Round to the nearest second.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

#

Buenos Aires (BA), Capital Federal (CF),

Zone America/Argentina/Buenos_Aires -3:53:48 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May # Cordoba Mean Time

-4:00 - ART 1930 Dec

-4:00 Arg AR%sT 1969 Oct 5

-3:00 Arg AR%sT 1999 Oct 3

-4:00 Arg AR%sT 2000 Mar 3

-3:00 Arg AR%sT

#

Cordoba (CB), Santa Fe (SF), Entre Rios (ER), Corrientes (CN), Misiones
(MN),

Chaco (CC), Formosa (FM), Santiago del Estero (SE)

#

Shanks & Pottenger also make the following claims, which we haven't verified:

- Formosa switched to -3:00 on 1991-01-07.

- Misiones switched to -3:00 on 1990-12-29.

- Chaco switched to -3:00 on 1991-01-04.

- Santiago del Estero switched to -4:00 on 1991-04-01,

then to -3:00 on 1991-04-26.

#

Zone America/Argentina/Cordoba -4:16:48 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May

-4:00 - ART 1930 Dec

-4:00 Arg AR%sT 1969 Oct 5

-3:00 Arg AR%sT 1991 Mar 3

-4:00 - WART 1991 Oct 20

-3:00 Arg AR%sT 1999 Oct 3

-4:00 Arg AR%sT 2000 Mar 3

-3:00 Arg AR%sT

#

Salta (SA), La Pampa (LP), Neuquen (NQ), Rio Negro (RN)

Zone America/Argentina/Salta -4:21:40 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May

-4:00 - ART 1930 Dec

-4:00 Arg AR%sT 1969 Oct 5

-3:00 Arg AR%sT 1991 Mar 3

-4:00 - WART 1991 Oct 20

-3:00 Arg AR%sT 1999 Oct 3

-4:00 Arg AR%sT 2000 Mar 3

-3:00 Arg AR%sT 2008 Oct

18

-3:00 - ART

#

Tucuman (TM)

Zone America/Argentina/Tucuman -4:20:52 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May

-4:00 - ART 1930 Dec

-4:00 Arg AR%sT 1969 Oct 5

-3:00 Arg AR%sT 1991 Mar 3

-4:00 - WART 1991 Oct 20

-3:00 Arg AR%sT 1999 Oct 3

-4:00 Arg AR%sT 2000 Mar 3

-3:00 - ART 2004 Jun 1

-4:00 - WART 2004 Jun 13

-3:00 Arg AR%sT

#

La Rioja (LR)

Zone America/Argentina/La_Rioja -4:27:24 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May

-4:00 - ART 1930 Dec

-4:00 Arg AR%sT 1969 Oct 5

-3:00 Arg AR%sT 1991 Mar 1

-4:00 - WART 1991 May 7

-3:00 Arg AR%sT 1999 Oct 3

-4:00 Arg AR%sT 2000 Mar 3

-3:00 - ART 2004 Jun 1

-4:00 - WART 2004 Jun 20

-3:00 Arg AR%sT 2008 Oct 18

-3:00 - ART

#

San Juan (SJ)

Zone America/Argentina/San_Juan -4:34:04 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May

-4:00 - ART 1930 Dec

-4:00 Arg AR%sT 1969 Oct 5

-3:00 Arg AR%sT 1991 Mar 1

-4:00 - WART 1991 May 7

-3:00 Arg AR%sT 1999 Oct 3

-4:00 Arg AR%sT 2000

Mar 3

-3:00 - ART 2004 May 31

-4:00 - WART 2004 Jul 25

-3:00 Arg AR%sT 2008 Oct 18

-3:00 - ART

#

Jujuy (JY)

Zone America/Argentina/Jujuy -4:21:12 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May

-4:00 - ART 1930 Dec
-4:00 Arg AR%sT 1969 Oct 5
-3:00 Arg AR%sT 1990 Mar 4
-4:00 - WART 1990 Oct 28
-4:00 1:00 WARST 1991 Mar 17
-4:00 - WART 1991 Oct 6
-3:00 1:00 ARST 1992
-3:00 Arg AR%sT 1999 Oct 3
-4:00 Arg AR%sT 2000 Mar 3
-3:00 Arg AR%sT 2008 Oct 18
-3:00 - ART

#

Catamarca (CT), Chubut (CH)

Zone America/Argentina/Catamarca -4:23:08 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May
-4:00 - ART 1930 Dec
-4:00 Arg AR%sT 1969 Oct 5
-3:00 Arg AR%sT 1991 Mar 3
-4:00 - WART 1991 Oct 20
-3:00 Arg AR%sT 1999 Oct 3
-4:00 Arg AR%sT 2000 Mar 3
-3:00 - ART 2004 Jun 1
-4:00 - WART 2004 Jun 20
-3:00 Arg AR%sT 2008 Oct 18
-3:00 - ART

#

Mendoza (MZ)

Zone America/Argentina/Mendoza -4:35:16 - LMT 1894

Oct 31

-4:16:48 - CMT 1920 May
-4:00 - ART 1930 Dec
-4:00 Arg AR%sT 1969 Oct 5
-3:00 Arg AR%sT 1990 Mar 4
-4:00 - WART 1990 Oct 15
-4:00 1:00 WARST 1991 Mar 1
-4:00 - WART 1991 Oct 15
-4:00 1:00 WARST 1992 Mar 1
-4:00 - WART 1992 Oct 18
-3:00 Arg AR%sT 1999 Oct 3
-4:00 Arg AR%sT 2000 Mar 3
-3:00 - ART 2004 May 23
-4:00 - WART 2004 Sep 26
-3:00 Arg AR%sT 2008 Oct 18
-3:00 - ART

#

San Luis (SL)

Rule SanLuis 2008 2009 - Mar Sun>=8 0:00 0 -

Rule SanLuis 2007 2009 - Oct Sun>=8 0:00 1:00 S

Zone America/Argentina/San_Luis -4:25:24 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May
-4:00 - ART 1930 Dec
-4:00 Arg AR%sT 1969 Oct 5
-3:00 Arg AR%sT 1990
-3:00 1:00 ARST 1990 Mar 14
-4:00 - WART 1990 Oct 15
-4:00 1:00 WARST 1991 Mar 1
-4:00 - WART 1991 Jun 1
-3:00 - ART 1999 Oct 3
-4:00 1:00 WARST 2000 Mar 3
-3:00 - ART 2004 May 31
-4:00 - WART 2004 Jul 25
-3:00 Arg AR%sT 2008 Jan 21
-4:00 SanLuis WAR%sT

#

#

Santa Cruz (SC)

Zone America/Argentina/Rio_Gallegos -4:36:52 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May # Cordoba Mean Time
-4:00 - ART 1930 Dec
-4:00 Arg AR%sT 1969 Oct 5
-3:00 Arg AR%sT 1999 Oct 3
-4:00 Arg AR%sT 2000 Mar 3
-3:00 - ART 2004 Jun 1
-4:00 - WART 2004 Jun 20
-3:00 Arg AR%sT 2008 Oct 18
-3:00 - ART

#

Tierra del Fuego, Antartida e Islas del Atlantico Sur (TF)

Zone America/Argentina/Ushuaia -4:33:12 - LMT 1894 Oct 31

-4:16:48 - CMT 1920 May # Cordoba Mean Time
-4:00 - ART 1930 Dec
-4:00 Arg AR%sT 1969 Oct 5
-3:00 Arg AR%sT 1999 Oct 3
-4:00 Arg AR%sT 2000 Mar 3
-3:00 - ART 2004 May 30
-4:00 - WART 2004 Jun 20
-3:00 Arg AR%sT 2008 Oct 18
-3:00 - ART

Aruba

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Aruba -4:40:24 - LMT 1912 Feb 12 # Oranjestad

-4:30 - ANT 1965 # Netherlands Antilles Time
-4:00 - AST

Bolivia
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/La_Paz -4:32:36 - LMT 1890
-4:32:36
- CMT 1931 Oct 15 # Calamarca MT
-4:32:36 1:00 BOST 1932 Mar 21 # Bolivia ST
-4:00 - BOT # Bolivia Time

Brazil

From Paul Eggert (1993-11-18):
The mayor of Rio recently attempted to change the time zone rules
just in his city, in order to leave more summer time for the tourist trade.
The rule change lasted only part of the day;
the federal government refused to follow the city's rules, and business
was in a chaos, so the mayor backed down that afternoon.

From IATA SSIM (1996-02):
Only the following states in BR1 observe DST: Rio Grande do Sul (RS),
Santa Catarina (SC), Parana (PR), Sao Paulo (SP), Rio de Janeiro (RJ),
Espirito Santo (ES), Minas Gerais (MG), Bahia (BA), Goias (GO),
Distrito Federal (DF), Tocantins (TO), Sergipe [SE] and Alagoas [AL].
[The last three states are new to this issue of the IATA SSIM.]

From Gwillim Law (1996-10-07):
Geography, history (Tocantins was part of Goias until 1989), and other
sources of time zone information
lead me to believe that AL, SE, and TO were
always in BR1, and so the only change was whether or not they observed DST....
The earliest issue of the SSIM I have is 2/91. Each issue from then until
9/95 says that DST is observed only in the ten states I quoted from 9/95,
along with Mato Grosso (MT) and Mato Grosso do Sul (MS), which are in BR2
(UTC-4).... The other two time zones given for Brazil are BR3, which is
UTC-5, no DST, and applies only in the state of Acre (AC); and BR4, which is
UTC-2, and applies to Fernando de Noronha (formerly FN, but I believe it's
become part of the state of Pernambuco). The boundary between BR1 and BR2
has never been clearly stated. They've simply been called East and West.
However, some conclusions can be drawn from another IATA manual: the Airline
Coding Directory, which lists close to 400 airports in Brazil. For each
airport it gives a time zone which is coded to the SSIM. From that
information, I'm led to conclude
that the states of Amapa (AP), Ceara (CE),
Maranhao (MA), Paraiba (PR), Pernambuco (PE), Piaui (PI), and Rio Grande do
Norte (RN), and the eastern part of Para (PA) are all in BR1 without DST.

From Marcos Tadeu (1998-09-27):

Brazilian official page

From Jesper Norgaard (2000-11-03):

[For an official list of which regions in Brazil use which time zones, see:]

<http://pcdsh01.on.br/Fusbr.htm>

<http://pcdsh01.on.br/Fusbrhv.htm>

From Celso Doria via David Madeo (2002-10-09):

The reason for the delay this year has to do with elections in Brazil.

#

Unlike in the United States, elections in Brazil are 100% computerized and

the results are known almost immediately. Yesterday, it was the first

round of the elections when 115 million Brazilians voted for President,

Governor, Senators, Federal Deputies, and State Deputies. Nobody is

counting (or re-counting) votes anymore and we know there will be a second

#

round for the Presidency and also for some Governors. The 2nd round will

take place on October 27th.

#

The reason why the DST will only begin November 3rd is that the thousands

of electoral machines used cannot have their time changed, and since the

Constitution says the elections must begin at 8:00 AM and end at 5:00 PM,

the Government decided to postpone DST, instead of changing the Constitution

(maybe, for the next elections, it will be possible to change the clock)...

From Rodrigo Severo (2004-10-04):

It's just the biannual change made necessary by the much hyped, supposedly

modern Brazilian electronic voting machines which, apparently, can't deal

with a time change between the first and the second rounds of the elections.

From Steffen Thorsen (2007-09-20):

Brazil will start DST on 2007-10-14 00:00 and end on 2008-02-17 00:00:

#

<http://www.mme.gov.br/site/news/detail.do;jsessionid=BBA06811AFCAAC28F0285210913513DA?newsId=13975>

From Paul Schulze (2008-06-24):

#

...by law number 11.662 of April 24, 2008 (published in the "Diario

Oficial da Uniao"...) in Brazil there are changes in the timezones,

effective today (00:00am at June 24, 2008) as follows:

#

a) The timezone UTC+5 is extinguished, with all the Acre state and the

part of the Amazonas state that had this timezone now being put to the

timezone UTC+4

b) The whole Para state now is put at timezone UTC+3, instead of just

part of it, as was before.

#

This change follows a proposal of senator Tiao Viana of Acre state, that
proposed it due to concerns about open television channels displaying
programs inappropriate to youths in the states that had the timezone
UTC+5 too early in the night. In the occasion, some more corrections
were proposed, trying to unify the timezones of any given state. This
change modifies timezone rules defined in decree 2.784 of 18 June,
1913.

From Rodrigo Severo (2008-06-24):

Just correcting the URL:

#

https://www.in.gov.br/imprensa/visualiza/index.jsp?jornal=do&secao=1&pagina=1&data=25/04/2008

#

As a result of the above Decree I believe the America/Rio_Branco
timezone shall be modified from UTC-5 to UTC-4 and a new timezone shall
be created to represent the...west side of the Para State. I
suggest this new timezone be called Santarem as the most
important/populated city in the affected area.

#

This new timezone would be the same as the Rio_Branco timezone up to
the 2008/06/24 change which would be to UTC-3 instead of UTC-4.

From Alex Krivenyshev (2008-06-24):

This is a quick reference page for New and Old Brazil Time Zones map.

http://www.worldtimezone.com/brazil-time-new-old.php

#

- 4 time zones replaced by 3 time zones-eliminating time zone UTC- 05
(state Acre and the part of the Amazonas will
be UTC/GMT- 04) - western
part of Par state is moving to one timezone UTC- 03 (from UTC -04).

From Paul Eggert (2002-10-10):

The official decrees referenced below are mostly taken from

Decretos sobre o Horário de Verao no Brasil

.

From Steffen Thorsen (2008-08-29):

As announced by the government and many newspapers in Brazil late
yesterday, Brazil will start DST on 2008-10-19 (need to change rule) and
it will end on 2009-02-15 (current rule for Brazil is fine). Based on
past years experience with the elections, there was a good chance that
the start was postponed to November, but it did not happen this year.

#

It has not yet been posted to <http://pcdsh01.on.br/DecHV.html>

An official page about it:
<http://www.mme.gov.br/site/news/detail.do?newsId=16722>
<http://www.mme.gov.br/site/news/detail.do?newsId=16722>

Note that this link does not always work directly, but must be accessed
by going
to
<http://www.mme.gov.br/first>
<http://www.mme.gov.br/first>

One example link that works directly:
http://jornale.com.br/index.php?option=com_content&task=view&id=13530&Itemid=54
http://jornale.com.br/index.php?option=com_content&task=view&id=13530&Itemid=54
(Portuguese)

We have a written a short article about it as well:
<http://www.timeanddate.com/news/time/brazil-dst-2008-2009.html>
<http://www.timeanddate.com/news/time/brazil-dst-2008-2009.html>

From Alexander Krivenyshev (2011-10-04):
State Bahia will return to Daylight savings time this year after 8 years off.
The announcement was made by Governor Jaques Wagner in an interview to a
television station in Salvador.

In Portuguese:
<http://g1.globo.com/bahia/noticia/2011/10/governador-jaques-wagner-confirma-horario-de-verao-na-bahia.html>
<http://g1.globo.com/bahia/noticia/2011/10/governador-jaques-wagner-confirma-horario-de-verao-na-bahia.html>

and
<http://noticias.terra.com.br/brasil/noticias/0,,OI5390887-EI8139,00-Bahia+volta+a+ter+horario+de+verao+apos+oito+anos.html>
<http://noticias.terra.com.br/brasil/noticias/0,,OI5390887-EI8139,00-Bahia+volta+a+ter+horario+de+verao+apos+oito+anos.html>
#

From Guilherme Bernardes Rodrigues (2011-10-07):
There is news in the media, however there is still no decree about it.
I just send a e-mail to Zulmira Brandao at
<http://pcdsh01.on.br/> the
official agency about time in Brazil, and she confirmed that the old rule is
still in force.

From Guilherme Bernardes Rodrigues (2011-10-14)
It's official, the President signed a decree that includes Bahia in summer
time.
[and in a second message (same day):]
I found the decree.

DECRETO No- 7.584, DE 13 DE OUTUBRO DE 2011
Link :

http://www.in.gov.br/visualiza/index.jsp?data=13/10/2011&jornal=1000&pagina=6&totalArquivos=6

From Kelley Cook (2012-10-16):
The governor of state of Bahia in Brazil announced on Thursday that
due to public pressure, he is reversing the DST policy they implemented
last year and will not be going to Summer Time on October 21st...
<http://www.correio24horas.com.br/r/artigo/apos-pessoes-wagner-suspende-horario-de-verao-na-bahia>

From Rodrigo Severo (2012-10-16):
Tocantins state will have DST.
<http://noticias.terra.com.br/brasil/noticias/0,,OI6232536-EI306.html>

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Decree 20,466 (1931-10-01)
Decree 21,896 (1932-01-10)
Rule Brazil 1931 only - Oct 3 11:00 1:00 S
Rule Brazil 1932 1933 - Apr 1 0:00 0 -
Rule Brazil 1932 only - Oct 3 0:00 1:00 S
Decree 23,195 (1933-10-10)
revoked DST.
Decree
27,496 (1949-11-24)
Decree 27,998 (1950-04-13)
Rule Brazil 1949 1952 - Dec 1 0:00 1:00 S
Rule Brazil 1950 only - Apr 16 1:00 0 -
Rule Brazil 1951 1952 - Apr 1 0:00 0 -
Decree 32,308 (1953-02-24)
Rule Brazil 1953 only - Mar 1 0:00 0 -
Decree 34,724 (1953-11-30)
revoked DST.
Decree 52,700 (1963-10-18)
established DST from 1963-10-23 00:00 to 1964-02-29 00:00
in SP, RJ, GB, MG, ES, due to the prolongation of the drought.
Decree 53,071 (1963-12-03)
extended the above decree to all of the national territory on 12-09.
Rule Brazil 1963 only - Dec 9 0:00 1:00 S
Decree 53,604 (1964-02-25)

extended summer time by one day to 1964-03-01 00:00
(start of school).
Rule Brazil 1964 only - Mar 1 0:00 0 -
Decree 55,639 (1965-01-27)
Rule Brazil 1965 only - Jan 31 0:00 1:00 S
Rule Brazil 1965 only - Mar 31 0:00 0 -
Decree 57,303 (1965-11-22)
Rule Brazil 1965 only - Dec 1 0:00 1:00 S
Decree 57,843 (1966-02-18)
Rule Brazil 1966 1968 - Mar 1 0:00 0 -
Rule Brazil 1966 1967 - Nov 1 0:00 1:00 S
Decree 63,429 (1968-10-15)
revoked DST.
Decree 91,698 (1985-09-27)
Rule Brazil 1985 only - Nov 2 0:00 1:00 S
Decree 92,310 (1986-01-21)
Decree 92,463 (1986-03-13)
Rule Brazil 1986 only - Mar 15 0:00 0 -
Decree 93,316 (1986-10-01)
Rule Brazil 1986 only - Oct 25 0:00 1:00 S
Rule Brazil 1987 only - Feb 14 0:00 0 -
Decree 94,922 (1987-09-22)
Rule Brazil 1987 only - Oct 25
0:00 1:00 S
Rule Brazil 1988 only - Feb 7 0:00 0 -
Decree 96,676 (1988-09-12)
except for the states of AC, AM, PA, RR, RO, and AP (then a territory)
Rule Brazil 1988 only - Oct 16 0:00 1:00 S
Rule Brazil 1989 only - Jan 29 0:00 0 -
Decree 98,077 (1989-08-21)
with the same exceptions
Rule Brazil 1989 only - Oct 15 0:00 1:00 S
Rule Brazil 1990 only - Feb 11 0:00 0 -
Decree 99,530 (1990-09-17)
adopted by RS, SC, PR, SP, RJ, ES, MG, GO, MS, DF.
Decree 99,629 (1990-10-19) adds BA, MT.
Rule Brazil 1990 only - Oct 21 0:00 1:00 S
Rule Brazil 1991 only - Feb 17 0:00 0 -
Unnumbered decree (1991-09-25)
adopted by RS, SC, PR, SP, RJ, ES, MG, BA, GO, MT, MS, DF.
Rule Brazil 1991 only - Oct 20 0:00 1:00 S
Rule Brazil 1992 only - Feb 9 0:00 0 -
Unnumbered
decree (1992-10-16)
adopted by same states.
Rule Brazil 1992 only - Oct 25 0:00 1:00 S
Rule Brazil 1993 only - Jan 31 0:00 0 -
Decree 942 (1993-09-28)

adopted by same states, plus AM.
Decree 1,252 (1994-09-22;
web page corrected 2004-01-07) adopted by same states, minus AM.
Decree 1,636 (1995-09-14)
adopted by same states, plus MT and TO.
Decree 1,674 (1995-10-13)
adds AL, SE.
Rule Brazil 1993 1995 - Oct Sun>=11 0:00 1:00 S
Rule Brazil 1994 1995 - Feb Sun>=15 0:00 0 -
Rule Brazil 1996 only - Feb 11 0:00 0 -
Decree 2,000 (1996-09-04)
adopted by same states, minus AL, SE.
Rule Brazil 1996 only - Oct 6 0:00 1:00 S
Rule Brazil 1997 only - Feb 16 0:00 0 -
From Daniel C. Sobral (1998-02-12):

In 1997, the DS began on October 6. The stated reason was that
because international television networks ignored Brazil's policy on DS,
they bought the wrong times on satellite for coverage of Pope's visit.
This year, the ending date of DS was postponed to March 1
to help dealing with the shortages of electric power.

Decree 2,317 (1997-09-04), adopted by same states.
Rule Brazil 1997 only - Oct 6 0:00 1:00 S
Decree 2,495
(1998-02-10)
Rule Brazil 1998 only - Mar 1 0:00 0 -
Decree 2,780 (1998-09-11)
adopted by the same states as before.
Rule Brazil 1998 only - Oct 11 0:00 1:00 S
Rule Brazil 1999 only - Feb 21 0:00 0 -
Decree 3,150
(1999-08-23) adopted by same states.
Decree 3,188 (1999-09-30)
adds SE, AL, PB, PE, RN, CE, PI, MA and RR.
Rule Brazil 1999 only - Oct
3 0:00 1:00 S
Rule Brazil 2000 only - Feb 27 0:00 0 -
Decree 3,592 (2000-09-06)
adopted by the same states as before.
Decree 3,630 (2000-10-13)
repeals DST in PE and RR, effective 2000-10-15 00:00.
Decree 3,632 (2000-10-17)
repeals DST in SE, AL, PB, RN, CE, PI and MA, effective 2000-10-22 00:00.
Decree 3,916
(2001-09-13) reestablishes DST in AL, CE, MA, PB, PE, PI, RN, SE.
Rule Brazil 2000 2001 - Oct Sun>=8 0:00 1:00 S
Rule Brazil 2001 2006 - Feb Sun>=15 0:00 0 -

Decree 4,399 (2002-10-01) repeals DST in AL, CE, MA, PB, PE, PI, RN, SE.
4,399
Rule Brazil 2002 only - Nov 3 0:00 1:00 S
Decree 4,844 (2003-09-24; corrected 2003-09-26) repeals DST in BA, MT, TO.
4,844
Rule Brazil 2003 only - Oct 19
0:00 1:00 S
Decree 5,223 (2004-10-01) reestablishes DST in MT.
5,223
Rule Brazil 2004 only - Nov 2 0:00 1:00 S
Decree 5,539 (2005-09-19),
adopted by the same states as before.
Rule Brazil 2005 only - Oct 16 0:00 1:00 S
Decree 5,920 (2006-10-03),
adopted by the same states as before.
Rule Brazil 2006 only - Nov 5 0:00 1:00 S
Rule Brazil 2007 only - Feb 25 0:00 0 -
Decree 6,212 (2007-09-26),
adopted by the same states as before.
Rule Brazil 2007 only - Oct Sun>=8 0:00 1:00 S
From Frederico A. C. Neves (2008-09-10):
According to this decree

http://www.planalto.gov.br/ccivil_03/_Ato2007-2010/2008/Decreto/D6558.htm

[t]he DST period in Brazil now on will be from the 3rd Oct Sunday to the
3rd Feb Sunday. There is an exception on the return date when this is
the Carnival Sunday then the return date will be the next Sunday...
Rule Brazil 2008 max - Oct Sun>=15 0:00 1:00 S
Rule Brazil 2008 2011 - Feb Sun>=15 0:00 0 -
Rule Brazil 2012 only - Feb Sun>=22 0:00 0 -
Rule Brazil 2013 2014 - Feb Sun>=15 0:00 0 -
Rule Brazil 2015 only - Feb Sun>=22 0:00 0 -
Rule Brazil 2016 2022 - Feb Sun>=15 0:00 0 -
Rule Brazil 2023 only - Feb Sun>=22 0:00 0 -
Rule Brazil 2024 2025 - Feb Sun>=15 0:00 0 -
Rule Brazil 2026 only - Feb Sun>=22 0:00 0 -
Rule Brazil 2027 2033 - Feb Sun>=15 0:00 0 -
Rule Brazil 2034 only - Feb Sun>=22 0:00 0 -
Rule Brazil 2035 2036 - Feb Sun>=15 0:00 0 -
Rule Brazil 2037 only - Feb Sun>=22 0:00 0 -
From Arthur David Olson (2008-09-29):
The next is wrong in some years but is better than nothing.
Rule Brazil 2038 max - Feb Sun>=15 0:00 0 -
#

The latest ruleset listed above says that the following states observe DST:

DF, ES, GO, MG, MS, MT, PR, RJ, RS, SC, SP.

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

#

Fernando de Noronha (administratively part of PE)

Zone America/Noronha -2:09:40 - LMT 1914

-2:00 Brazil FN%sT 1990 Sep 17

-2:00 - FNT 1999 Sep 30

-2:00 Brazil FN%sT 2000 Oct 15

-2:00 - FNT 2001 Sep 13

-2:00 Brazil FN%sT 2002 Oct 1

-2:00 - FNT

Other Atlantic islands have no permanent settlement.

These include Trindade and Martin Vaz (administratively part of ES),

Atol das Rocas (RN), and Penedos de Sao Pedro e Sao Paulo (PE).

Fernando de Noronha was a separate territory from 1942-09-02 to 1989-01-01;

it also included the Penedos.

#

Amapa (AP), east Para (PA)

East Para includes Belem, Maraba, Serra Norte, and Sao Felix do Xingu.

The division between east and west Para is the river Xingu.

In the north a very small part from the river Javary (now Jari I guess,

#

the border with Amapa) to the Amazon, then to the Xingu.

Zone America/Belem -3:13:56 - LMT 1914

-3:00 Brazil BR%sT 1988 Sep 12

-3:00 - BRT

#

west Para (PA)

West Para includes Altamira, Oribidos, Prainha, Oriximina, and Santarem.

Zone America/Santarem -3:38:48 - LMT 1914

-4:00 Brazil AM%sT 1988 Sep 12

-4:00 - AMT 2008 Jun 24 00:00

-3:00 - BRT

#

Maranhao (MA), Piaui (PI), Ceara (CE), Rio Grande do Norte (RN),

Paraiba (PB)

Zone America/Fortaleza -2:34:00 - LMT 1914

-3:00 Brazil BR%sT 1990 Sep 17

-3:00 - BRT 1999 Sep 30

-3:00 Brazil BR%sT 2000 Oct 22

-3:00 - BRT 2001 Sep 13

-3:00 Brazil BR%sT 2002 Oct 1

-3:00 - BRT

#

Pernambuco (PE) (except Atlantic islands)

Zone America/Recife -2:19:36 - LMT 1914

-3:00 Brazil BR%sT 1990 Sep 17
 -3:00 - BRT 1999 Sep 30
 -3:00 Brazil BR%sT 2000 Oct 15
 -3:00 - BRT 2001 Sep 13
 -3:00 Brazil BR%sT 2002 Oct 1
 -3:00 - BRT
 #
 # Tocantins (TO)
 Zone America/Araguaina -3:12:48 - LMT 1914
 -3:00 Brazil BR%sT 1990
 Sep 17
 -3:00 - BRT 1995 Sep 14
 -3:00 Brazil BR%sT 2003 Sep 24
 -3:00 - BRT 2012 Oct 21
 -3:00 Brazil BR%sT
 #
 # Alagoas (AL), Sergipe (SE)
 Zone America/Maceio -2:22:52 - LMT 1914
 -3:00 Brazil BR%sT 1990 Sep 17
 -3:00 - BRT 1995 Oct 13
 -3:00 Brazil BR%sT 1996 Sep 4
 -3:00 - BRT 1999 Sep 30
 -3:00 Brazil BR%sT 2000 Oct 22
 -3:00 - BRT 2001 Sep 13
 -3:00 Brazil BR%sT 2002 Oct 1
 -3:00 - BRT
 #
 # Bahia (BA)
 # There are too many Salvadors elsewhere, so use America/Bahia instead
 # of America/Salvador.
 Zone America/Bahia -2:34:04 - LMT 1914
 -3:00 Brazil BR%sT 2003 Sep 24
 -3:00 - BRT 2011 Oct 16
 -3:00 Brazil BR%sT 2012 Oct 21
 -3:00 - BRT
 #
 # Goias (GO), Distrito Federal (DF), Minas Gerais (MG),
 # Espirito Santo (ES), Rio de Janeiro (RJ), Sao Paulo (SP), Parana (PR),
 # Santa Catarina (SC), Rio Grande do Sul (RS)
 Zone America/Sao_Paulo -3:06:28 - LMT 1914
 -3:00 Brazil BR%sT 1963 Oct 23 00:00
 -3:00 1:00 BRST 1964
 -3:00 Brazil BR%sT
 #
 # Mato
 Grosso do Sul (MS)
 Zone America/Campo_Grande -3:38:28 - LMT 1914
 -4:00 Brazil AM%sT

```

#
# Mato Grosso (MT)
Zone America/Cuiaba -3:44:20 - LMT 1914
-4:00 Brazil AM%sT 2003 Sep 24
-4:00 - AMT 2004 Oct 1
-4:00 Brazil AM%sT
#
# Rondonia (RO)
Zone America/Porto_Velho -4:15:36 - LMT 1914
-4:00 Brazil AM%sT 1988 Sep 12
-4:00 - AMT
#
# Roraima (RR)
Zone America/Boa_Vista -4:02:40 - LMT 1914
-4:00 Brazil AM%sT 1988 Sep 12
-4:00 - AMT 1999 Sep 30
-4:00 Brazil AM%sT 2000 Oct 15
-4:00 - AMT
#
# east Amazonas (AM): Boca do Acre, Jutai, Manaus, Floriano Peixoto
# The great circle line from Tabatinga to Porto Acre divides
# east from west Amazonas.
Zone America/Manaus -4:00:04 - LMT 1914
-4:00 Brazil AM%sT 1988 Sep 12
-4:00 - AMT 1993 Sep 28
-4:00 Brazil AM%sT 1994 Sep 22
-4:00 - AMT
#
# west Amazonas (AM): Atalaia do Norte, Boca do Maoco, Benjamin Constant,
# Eirunepe, Envira, Ipixuna
Zone America/Eirunepe -4:39:28 - LMT 1914
-5:00 Brazil AC%sT 1988 Sep
12
-5:00 - ACT 1993 Sep 28
-5:00 Brazil AC%sT 1994 Sep 22
-5:00 - ACT 2008 Jun 24 00:00
-4:00 - AMT
#
# Acre (AC)
Zone America/Rio_Branco -4:31:12 - LMT 1914
-5:00 Brazil AC%sT 1988 Sep 12
-5:00 - ACT 2008 Jun 24 00:00
-4:00 - AMT

# Chile

# From Eduardo Krell (1995-10-19):
# The law says to switch to DST at midnight [24:00] on the second SATURDAY

```


of October.... The law is the same for March and October.
(1998-09-29):
Because of the drought this year, the government decided to go into
DST earlier (saturday 9/26 at 24:00). This is a one-time change only ...
(unless there's another dry season next year, I guess).

From Julio I. Pacheco Troncoso (1999-03-18):
Because of the same drought, the government decided to end DST later,
on April 3, (one-time change).

From Oscar van Vlijmen (2006-10-08):
<http://www.horaoficial.cl/cambio.htm>

From Jesper Norgaard Welen (2006-10-08):
I think that there are some obvious mistakes in the suggested link
from
Oscar van Vlijmen,... for instance entry 66 says that GMT-4
ended 1990-09-12 while entry 67 only begins GMT-3 at 1990-09-15
(they should have been 1990-09-15 and 1990-09-16 respectively), but
anyhow it clears up some doubts too.

From Paul Eggert (2006-12-27):
The following data for Chile and America/Santiago are from
<http://www.horaoficial.cl/horaof.htm> (2006-09-20), transcribed by
Jesper Norgaard Welen. The data for Pacific/Easter are from Shanks
& Pottenger, except with DST transitions after 1932 cloned from
America/Santiago. The pre-1980 Pacific/Easter data are dubious,
but we have no other source.

From German Poo-Caaman~o (2008-03-03):
Due to drought, Chile extends Daylight Time in three weeks. This
is one-time change (Saturday 3/29 at 24:00 for America/Santiago
and Saturday 3/29 at 22:00 for Pacific/Easter)
The Supreme Decree is located at
<http://www.shoa.cl/servicios/supremo316.pdf>
<http://www.shoa.cl/servicios/supremo316.pdf>

[](#)
and the instructions for 2008 are located in:
<http://www.horaoficial.cl/cambio.htm>
<http://www.horaoficial.cl/cambio.htm>
[](#).

From Jose Miguel Garrido (2008-03-05):
...
You could see the announcements of the change on
<http://www.shoa.cl/noticias/2008/04hora/hora.htm>
<http://www.shoa.cl/noticias/2008/04hora/hora.htm>

.

From Angel Chiang (2010-03-04):

Subject: DST in Chile exceptionally extended to 3 April due to earthquake

http://www.gobiernodechile.cl/viewNoticia.aspx?idArticulo=30098

(in Spanish, last paragraph).

#

This is breaking news. There should be more information available later.

From Arthur David Olson (2010-03-06):

Angel Chiang's message confirmed by Julio Pacheco; Julio provided a patch.

From Glenn Eychaner (2011-03-02): [geychaner@mac.com]

It appears that the Chilean government has decided to postpone the

change from summer

time to winter time again, by three weeks to April

2nd:

http://www.emol.com/noticias/nacional/detalle/detallenoticias.asp?idnoticia=467651

#

This is not yet reflected in the official "cambio de hora" site, but

probably will be soon:

http://www.horaoficial.cl/cambio.htm

From Arthur David Olson (2011-03-02):

The emol.com article mentions a water shortage as the cause of the

postponement, which may mean that it's not a permanent change.

From Glenn Eychaner (2011-03-28):

The article:

http://diario.elmercurio.com/2011/03/28/_portada/_portada/noticias/7565897A-CA86-49E6-9E03-660B21A4883E.htm?id=3D{7565897A-CA86-49E6-9E03-660B21A4883E}

#

#

In English:

Chile's clocks will go back an hour this year on the 7th of May instead

of this Saturday. They will go forward again the 3rd Saturday in

August, not in October as they have since 1968. This is a pilot plan

which will be reevaluated in 2012.

From Mauricio Parada (2012-02-22), translated by Glenn Eychaner (2012-02-23):
As stated in the website of the Chilean Energy Ministry
<http://www.minenergia.cl/ministerio/noticias/generales/gobierno-anuncia-fechas-de-cambio-de.html>
The Chilean Government has decided to postpone the entrance into winter time
(to leave DST) from March 11 2012 to April 28th 2012. The decision has not
been yet formalized but it will within the next days.
Quote from the website communication:

6. For the year 2012, the dates of entry into winter time will be as follows:
a. Saturday April 28, 2012, clocks should go back 60 minutes; that is, at
23:59:59, instead of passing to 0:00, the time should be adjusted to be 23:00
of the same
day.
b. Saturday, September 1, 2012, clocks should go forward 60 minutes; that is,
at 23:59:59, instead of passing to 0:00, the time should be adjusted to be
01:00 on September 2.

From Steffen Thorsen (2013-02-15):
According to several news sources, Chile has extended DST this year,
they will end DST later and start DST earlier than planned. They
hope to save energy. The new end date is 2013-04-28 00:00 and new
start date is 2013-09-08 00:00....
<http://www.gob.cl/informa/2013/02/15/gobierno-anuncia-fechas-de-cambio-de-hora-para-el-ano-2013.htm>

NOTE: ChileAQ rules for Antarctic bases are stored separately in the
'antarctica' file.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Chile 1927 1932 - Sep 1 0:00 1:00 S
Rule Chile 1928 1932 - Apr 1 0:00 0 -
Rule Chile 1942 only - Jun 1 4:00u 0 -
Rule Chile 1942 only - Aug 1 5:00u 1:00 S
Rule Chile 1946 only - Jul 15 4:00u 1:00 S
Rule Chile 1946 only - Sep 1 3:00u 0:00 -
Rule Chile 1947 only - Apr 1 4:00u 0 -
Rule Chile 1968 only - Nov
3 4:00u 1:00 S
Rule Chile 1969 only - Mar 30 3:00u 0 -
Rule Chile 1969 only - Nov 23 4:00u 1:00 S
Rule Chile 1970 only - Mar 29 3:00u 0 -
Rule Chile 1971 only - Mar 14 3:00u 0 -
Rule Chile 1970 1972 - Oct Sun>=9 4:00u 1:00 S
Rule Chile 1972 1986 - Mar Sun>=9 3:00u 0 -
Rule Chile 1973 only - Sep 30 4:00u 1:00 S
Rule Chile 1974 1987 - Oct Sun>=9 4:00u 1:00 S
Rule Chile 1987 only - Apr 12 3:00u 0 -
Rule Chile 1988 1989 - Mar Sun>=9 3:00u 0 -
Rule Chile 1988 only - Oct Sun>=1 4:00u 1:00 S

Rule Chile 1989 only - Oct Sun>=9 4:00u 1:00 S
 Rule Chile 1990 only - Mar 18 3:00u 0 -
 Rule Chile 1990 only - Sep 16 4:00u 1:00 S
 Rule Chile 1991 1996 - Mar Sun>=9 3:00u 0 -
 Rule Chile 1991 1997 - Oct Sun>=9 4:00u 1:00 S
 Rule Chile 1997 only - Mar 30 3:00u 0 -
 Rule Chile 1998 only - Mar Sun>=9 3:00u 0 -
 Rule Chile 1998 only - Sep 27 4:00u 1:00 S
 Rule Chile 1999 only - Apr 4 3:00u 0 -
 Rule Chile 1999 2010 - Oct Sun>=9 4:00u 1:00 S
 Rule Chile 2000 2007 - Mar Sun>=9 3:00u 0 -
 #
 N.B.: the end of March 29 in Chile is March 30 in Universal time,
 # which is used below in specifying the transition.
 Rule Chile 2008 only - Mar 30 3:00u 0 -
 Rule Chile 2009 only - Mar Sun>=9 3:00u 0 -
 Rule Chile 2010 only - Apr Sun>=1 3:00u 0 -
 Rule Chile 2011 only - May Sun>=2 3:00u 0 -
 Rule Chile 2011 only - Aug Sun>=16 4:00u 1:00 S
 Rule Chile 2012 max - Apr Sun>=23 3:00u 0 -
 Rule Chile 2012 max - Sep Sun>=2 4:00u 1:00 S
 # IATA SSIM anomalies: (1992-02) says 1992-03-14;
 # (1996-09) says 1998-03-08. Ignore these.
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone America/Santiago -4:42:46 - LMT 1890
 -4:42:46 - SMT 1910 # Santiago Mean Time
 -5:00 - CLT 1916 Jul 1 # Chile Time
 -4:42:46 - SMT 1918 Sep 1 # Santiago Mean Time
 -4:00 - CLT 1919 Jul 1 # Chile Time
 -4:42:46 - SMT 1927 Sep 1 # Santiago Mean Time
 -5:00 Chile CL%sT 1947 May 22 # Chile Time
 -4:00 Chile CL%sT
 Zone Pacific/Easter -7:17:44 - LMT 1890
 -7:17:28 - EMT 1932 Sep # Easter Mean Time
 -7:00 Chile EAS%sT 1982
 Mar 13 21:00 # Easter I Time
 -6:00 Chile EAS%sT
 #
 # Sala y Gomez Island is like Pacific/Easter.
 # Other Chilean locations, including Juan Fernandez Is, San Ambrosio,
 # San Felix, and Antarctic bases, are like America/Santiago.

 # Colombia

 # Milne gives 4:56:16.4 for Bogota time in 1899; round to nearest. He writes,
 # "A variation of fifteen minutes in the public clocks of Bogota is not rare."

 # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule CO 1992 only - May 3 0:00 1:00 S
Rule CO 1993 only - Apr 4 0:00 0 -
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Bogota -4:56:16 - LMT 1884 Mar 13
-4:56:16 - BMT 1914 Nov 23 # Bogota Mean Time
-5:00 CO CO%ST # Colombia Time
Malpelo, Providencia, San Andres
no information; probably like America/Bogota

Curacao

Milne gives 4:35:46.9 for Curacao mean time; round to nearest.

From Paul Eggert (2006-03-22):
Shanks & Pottenger say that The Bottom and Philipsburg have been at
-4:00 since standard
time was introduced on 1912-03-02; and that
Kralendijk and Rincon used Kralendijk Mean Time (-4:33:08) from
1912-02-02 to 1965-01-01. The former is dubious, since S&P also say
Saba Island has been like Curacao.
This all predates our 1970 cutoff, though.

By July 2007 Curacao and St Maarten are planned to become
associated states within the Netherlands, much like Aruba;
Bonaire, Saba and St Eustatius would become directly part of the
Netherlands as Kingdom Islands. This won't affect their time zones
though, as far as we know.

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Curacao -4:35:47 - LMT 1912 Feb 12 # Willemstad
-4:30 - ANT 1965 # Netherlands Antilles Time
-4:00 - AST

From Arthur David Olson (2011-06-15):
At least for now, use links for places with new iso3166 codes.
The name "Lower Prince's Quarter" is both longer than fourteen characters
and contains an apostrophe; use "Lower_Princes" below.

Link America/Curacao America/Lower_Princes
Sint Maarten
Link America/Curacao America/Kralendijk # Bonaire, Sint Eustatius and Saba

Ecuador

Milne says the Sentral and South American Telegraph Company used -5:24:15.

From Paul Eggert (2007-03-04):
Apparently Ecuador had a failed experiment with DST in 1992.

<<http://midena.gov.ec/content/view/1261/208/>> (2007-02-27) and
<http://www.hoy.com.ec/NoticiaNue.asp?row_id=249856> (2006-11-06) both
talk about "hora Sixto". Leave this alone for now, as we have no data.

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Guayaquil -5:19:20 - LMT 1890
-5:14:00 - QMT 1931 # Quito Mean Time
-5:00 - ECT # Ecuador Time
Zone Pacific/Galapagos -5:58:24 - LMT 1931 # Puerto Baquerizo Moreno
-5:00 - ECT 1986
-6:00 - GALT # Galapagos Time

Falklands

From Paul Eggert (2006-03-22):
Between 1990 and 2000 inclusive, Shanks & Pottenger and the IATA agree except
the IATA gives 1996-09-08. Go with Shanks & Pottenger.

From Falkland Islands Government
Office, London (2001-01-22)
via Jesper Norgaard:
... the clocks revert back to Local Mean Time at 2 am on Sunday 15
April 2001 and advance one hour to summer time at 2 am on Sunday 2
September. It is anticipated that the clocks will revert back at 2
am on Sunday 21 April 2002 and advance to summer time at 2 am on
Sunday 1 September.

From Rives McDow (2001-02-13):

I have communicated several times with people there, and the last
time I had communications that was helpful was in 1998. Here is
what was said then:

"The general rule was that Stanley used daylight saving and the Camp
did not. However for various reasons many people in the Camp have
started to use daylight saving (known locally as 'Stanley Time')
There is no rule as to who uses daylight saving - it is a matter of
personal choice and so it is impossible to draw a map showing who
uses it and who does not. Any list would be out of date as soon as
it was produced. This year daylight
saving ended on April 18/19th
and started again on September 12/13th. I do not know what the rule
is, but can find out if you like. We do not change at the same time
as UK or Chile."

I did have in my notes that the rule was "Second Saturday in Sep at
0:00 until third Saturday in Apr at 0:00". I think that this does
not agree in some cases with Shanks; is this true?

#

Also, there is no mention in the list that some areas in the
Falklands do not use DST. I have found in my communications there
that these areas are on the western half of East Falkland and all of
West Falkland. Stanley is the only place that consistently observes
DST. Again, as in other places in the world, the farmers don't like
it. West Falkland is almost entirely sheep farmers.

#

I know one lady there that keeps a list of which farm keeps DST and
which doesn't each year. She runs a shop in Stanley, and says that
the list changes each year. She uses it to communicate to her
customers,
catching them when they are home for lunch or dinner.

From Paul Eggert (2001-03-05):
For now, we'll just record the time in Stanley, since we have no
better info.

From Steffen Thorsen (2011-04-01):
The Falkland Islands will not turn back clocks this winter, but stay on
daylight saving time.

#

One source:

http://www.falklandnews.com/public/story.cfm?get=5914&source=3

#

We have gotten this confirmed by a clerk of the legislative assembly:
Normally the clocks revert to Local Mean Time (UTC/GMT -4 hours) on the
third Sunday of April at 0200hrs and advance to Summer Time (UTC/GMT -3
hours) on the first Sunday of September at 0200hrs.

#

IMPORTANT NOTE: During 2011, on a trial basis, the Falkland Islands
will not revert to local mean time, but clocks will remain on Summer
time (UTC/GMT - 3 hours) throughout the whole of 2011. Any long term
change to local time following
the trial period will be notified.

#

From Andrew Newman (2012-02-24)
A letter from Justin McPhee, Chief Executive,
Cable & Wireless Falkland Islands (dated 2012-02-22)
states...
The current Atlantic/Stanley entry under South America expects the
clocks to go back to standard Falklands Time (FKT) on the 15th April.
The database entry states that in 2011 Stanley was staying on fixed
summer time on a trial basis only. FIG need to contact IANA and/or
the maintainers of the database to inform them we're adopting
the same policy this year and suggest recommendations for future years.

```

#
# For now we will assume permanent summer time for the Falklands
# until advised differently (to apply for 2012 and beyond, after the 2011
# experiment was apparently successful.)
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Falk 1937 1938 - Sep lastSun 0:00 1:00 S
Rule Falk 1938 1942 - Mar Sun>=19 0:00 0 -
Rule Falk 1939 only - Oct 1 0:00 1:00 S
Rule Falk 1940 1942 - Sep lastSun 0:00 1:00 S
Rule Falk 1943 only - Jan 1 0:00 0 -
Rule Falk 1983 only - Sep lastSun 0:00 1:00 S
Rule Falk 1984 1985 - Apr lastSun 0:00 0 -
Rule Falk 1984 only - Sep 16 0:00 1:00 S
Rule Falk 1985 2000 - Sep Sun>=9 0:00 1:00 S
Rule Falk 1986 2000 - Apr Sun>=16 0:00 0 -
Rule Falk 2001 2010 - Apr Sun>=15 2:00 0 -
Rule Falk 2001 2010 - Sep Sun>=1 2:00 1:00 S
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Atlantic/Stanley -3:51:24 - LMT 1890
-3:51:24 - SMT 1912 Mar 12 # Stanley Mean Time
-4:00 Falk FK%sT 1983 May # Falkland Is Time
-3:00 Falk FK%sT 1985 Sep 15
-4:00 Falk FK%sT 2010 Sep 5 02:00
-3:00 - FKST

# French Guiana
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Cayenne -3:29:20 - LMT 1911 Jul
-4:00 - GFT 1967 Oct # French Guiana Time
-3:00 - GFT

# Guyana
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Guyana -3:52:40 - LMT 1915 Mar # Georgetown
-3:45 - GBGT 1966 May 26 # Br Guiana Time
-3:45 - GYT 1975 Jul 31 # Guyana Time
-3:00 - GYT 1991
#
IATA SSIM (1996-06) says -4:00. Assume a 1991 switch.
-4:00 - GYT

# Paraguay
# From Paul Eggert (2006-03-22):
# Shanks & Pottenger say that spring transitions are from 01:00 -> 02:00,
# and autumn transitions are from 00:00 -> 23:00. Go with pre-1999
# editions of Shanks, and with the IATA, who say transitions occur at 00:00.
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

```


Rule Para 1975 1988 - Oct 1 0:00 1:00 S
 Rule Para 1975 1978 - Mar 1 0:00 0 -
 Rule Para 1979 1991 - Apr 1 0:00 0 -
 Rule Para 1989 only - Oct 22 0:00 1:00 S
 Rule Para 1990 only - Oct 1 0:00 1:00 S
 Rule Para 1991 only - Oct 6 0:00 1:00 S
 Rule Para 1992 only - Mar 1 0:00 0 -
 Rule Para 1992 only - Oct 5 0:00 1:00 S
 Rule Para 1993 only - Mar 31 0:00 0 -
 Rule Para 1993 1995 - Oct 1 0:00 1:00 S
 Rule Para 1994 1995 - Feb lastSun 0:00 0 -
 Rule Para 1996 only - Mar 1 0:00 0 -
 # IATA SSIM (2000-02) says 1999-10-10; ignore this for now.
 # From Steffen Thorsen (2000-10-02):
 # I have three independent
 reports that Paraguay changed to DST this Sunday
 # (10-01).
 #
 # Translated by Gwillim Law (2001-02-27) from
 #
 # Noticias, a daily paper in Asuncion, Paraguay (2000-10-01)
 # :
 # Starting at 0:00 today, the clock will be set forward 60 minutes, in
 # fulfillment of Decree No. 7,273 of the Executive Power.... The time change
 # system has been operating for several years. Formerly there was a separate
 # decree each year; the new law has the same effect, but permanently. Every
 # year, the time will change on the first Sunday of October; likewise, the
 # clock will be set back on the first Sunday of March.
 #
 Rule Para 1996 2001 - Oct Sun>=1 0:00 1:00 S
 # IATA SSIM (1997-09) says Mar 1; go with Shanks & Pottenger.
 Rule Para 1997 only - Feb lastSun 0:00 0 -
 # Shanks & Pottenger say 1999-02-28; IATA SSIM (1999-02) says 1999-02-27, but
 # (1999-09) reports no date; go with above sources and Gerd Knops (2001-02-27).
 Rule Para 1998 2001 - Mar Sun>=1 0:00 0 -
 #
 From Rives McDow (2002-02-28):
 # A decree was issued in Paraguay (no. 16350) on 2002-02-26 that changed the
 # dst method to be from the first Sunday in September to the first Sunday in
 # April.
 Rule Para 2002 2004 - Apr Sun>=1 0:00 0 -
 Rule Para 2002 2003 - Sep Sun>=1 0:00 1:00 S
 #
 # From Jesper Norgaard Welen (2005-01-02):
 # There are several sources that claim that Paraguay made
 # a timezone rule change in autumn 2004.
 # From Steffen Thorsen (2005-01-05):
 # Decree 1,867 (2004-03-05)

From Carlos Raul Perasso via Jesper Norgaard Welen (2006-10-13)
<<http://www.presidencia.gov.py/decretos/D1867.pdf>>
Rule Para 2004 2009 - Oct Sun>=15 0:00 1:00 S
Rule Para 2005 2009 - Mar Sun>=8 0:00 0 -
From Carlos Raul Perasso (2010-02-18):
By decree number 3958 issued yesterday (

<http://www.presidencia.gov.py/v1/wp-content/uploads/2010/02/decreto3958.pdf>

)

Paraguay changes its DST schedule, postponing the March rule to April and
modifying the October date. The decree reads:
...
Art. 1. It is hereby established that from the second Sunday of the month of
April of this year (2010), the official time is to be set back 60 minutes,
and that on the first Sunday of the month of October, it is to be set
forward 60 minutes, in all the territory of the Paraguayan Republic.
...
Rule Para 2010 max - Oct Sun>=1 0:00 1:00 S
Rule Para 2010 2012 - Apr Sun>=8 0:00 0 -

From Steffen Thorsen (2013-03-07):
Paraguay will end DST on 2013-03-24 00:00....
<http://www.ande.gov.py/interna.php?id=1075>

From Carlos Raul Perasso (2013-03-15):
The change in Paraguay is now final. Decree number 10780
<http://www.presidencia.gov.py/uploads/pdf/presidencia-3b86ff4b691c79d4f5927ca964922ec74772ce857c02ca054a52a37b49afc7fb.pdf>
Rule Para 2013 max - Mar Sun>=22 0:00 0 -

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Asuncion -3:50:40 - LMT 1890
-3:50:40
- AMT 1931 Oct 10 # Asuncion Mean Time
-4:00 - PYT 1972 Oct # Paraguay Time
-3:00 - PYT 1974 Apr
-4:00 Para PY%sT

Peru

From Evelyn C. Leeper via Mark Brader (2003-10-26):
When we were in Peru in 1985-1986, they apparently switched over
sometime between December 29 and January 3 while we were on the Amazon.

From Paul Eggert (2006-03-22):

Shanks & Pottenger don't have this transition. Assume 1986 was like 1987.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Peru 1938 only - Jan 1 0:00 1:00 S

Rule Peru 1938 only - Apr 1 0:00 0 -

Rule Peru 1938 1939 - Sep lastSun 0:00 1:00 S

Rule Peru 1939 1940 - Mar Sun>=24 0:00 0 -

Rule Peru 1986 1987 - Jan 1 0:00 1:00 S

Rule Peru 1986 1987 - Apr 1 0:00 0 -

Rule Peru 1990 only - Jan 1 0:00 1:00 S

Rule Peru 1990 only - Apr 1 0:00 0 -

IATA is ambiguous for 1993/1995; go with Shanks & Pottenger.

Rule Peru 1994 only - Jan 1 0:00 1:00 S

Rule Peru 1994 only - Apr

1 0:00 0 -

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Lima -5:08:12 - LMT 1890

-5:08:36 - LMT 1908 Jul 28 # Lima Mean Time?

-5:00 Peru PE%ST # Peru Time

South Georgia

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Atlantic/South_Georgia -2:26:08 - LMT 1890 # Grytviken

-2:00 - GST # South Georgia Time

South Sandwich Is

uninhabited; scientific personnel have wintered

Suriname

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Paramaribo -3:40:40 - LMT 1911

-3:40:52 - PMT 1935 # Paramaribo Mean Time

-3:40:36 - PMT 1945 Oct # The capital moved?

-3:30 - NEGT 1975 Nov 20 # Dutch Guiana Time

-3:30 - SRT 1984 Oct # Suriname Time

-3:00 - SRT

Trinidad and Tobago

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Port_of_Spain -4:06:04 - LMT 1912 Mar 2

-4:00 - AST

Uruguay

From Paul Eggert (1993-11-18):

Uruguay wins the prize for the strangest peacetime manipulation of the rules.

From Shanks

& Pottenger:

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Whitman gives 1923 Oct 1; go with Shanks & Pottenger.
Rule Uruguay 1923 only - Oct 2 0:00 0:30 HS
Rule Uruguay 1924 1926 - Apr 1 0:00 0 -
Rule Uruguay 1924 1925 - Oct 1 0:00 0:30 HS
Rule Uruguay 1933 1935 - Oct lastSun 0:00 0:30 HS
Shanks & Pottenger give 1935 Apr 1 0:00 & 1936 Mar 30 0:00; go with Whitman.
Rule Uruguay 1934 1936 - Mar Sat>=25 23:30s 0 -
Rule Uruguay 1936 only - Nov 1 0:00 0:30 HS
Rule Uruguay 1937 1941 - Mar lastSun 0:00 0 -
Whitman gives 1937 Oct 3; go with Shanks & Pottenger.
Rule Uruguay 1937 1940 - Oct lastSun 0:00 0:30 HS
Whitman gives 1941 Oct 24 - 1942 Mar 27, 1942 Dec 14 - 1943 Apr 13,
and 1943 Apr 13 ``to present time"; go with Shanks & Pottenger.
Rule Uruguay 1941 only - Aug 1 0:00 0:30 HS
Rule Uruguay 1942 only - Jan 1 0:00 0 -
Rule Uruguay 1942 only - Dec 14 0:00 1:00 S
Rule Uruguay 1943 only - Mar 14 0:00 0 -
Rule Uruguay 1959 only - May 24 0:00 1:00 S
Rule Uruguay 1959 only - Nov 15
0:00 0 -
Rule Uruguay 1960 only - Jan 17 0:00 1:00 S
Rule Uruguay 1960 only - Mar 6 0:00 0 -
Rule Uruguay 1965 1967 - Apr Sun>=1 0:00 1:00 S
Rule Uruguay 1965 only - Sep 26 0:00 0 -
Rule Uruguay 1966 1967 - Oct 31 0:00 0 -
Rule Uruguay 1968 1970 - May 27 0:00 0:30 HS
Rule Uruguay 1968 1970 - Dec 2 0:00 0 -
Rule Uruguay 1972 only - Apr 24 0:00 1:00 S
Rule Uruguay 1972 only - Aug 15 0:00 0 -
Rule Uruguay 1974 only - Mar 10 0:00 0:30 HS
Rule Uruguay 1974 only - Dec 22 0:00 1:00 S
Rule Uruguay 1976 only - Oct 1 0:00 0 -
Rule Uruguay 1977 only - Dec 4 0:00 1:00 S
Rule Uruguay 1978 only - Apr 1 0:00 0 -
Rule Uruguay 1979 only - Oct 1 0:00 1:00 S
Rule Uruguay 1980 only - May 1 0:00 0 -
Rule Uruguay 1987 only - Dec 14 0:00 1:00 S
Rule Uruguay 1988 only - Mar 14 0:00 0 -
Rule Uruguay 1988 only - Dec 11 0:00 1:00 S
Rule Uruguay 1989 only - Mar 12 0:00 0 -
Rule Uruguay 1989 only - Oct 29 0:00 1:00 S
Shanks & Pottenger say no DST was observed in 1990/1
and 1991/2,
and that 1992/3's DST was from 10-25 to 03-01. Go with IATA.
Rule Uruguay 1990 1992 - Mar Sun>=1 0:00 0 -
Rule Uruguay 1990 1991 - Oct Sun>=21 0:00 1:00 S
Rule Uruguay 1992 only - Oct 18 0:00 1:00 S
Rule Uruguay 1993 only - Feb 28 0:00 0 -

```
# From Eduardo Cota (2004-09-20):
# The uruguayan government has decreed a change in the local time...
# http://www.presidencia.gub.uy/decretos/2004091502.htm
Rule Uruguay 2004 only - Sep 19 0:00 1:00 S
# From Steffen Thorsen (2005-03-11):
# Uruguay's DST was scheduled to end on Sunday, 2005-03-13, but in order to
# save energy ... it was postponed two weeks...
# http://www.presidencia.gub.uy/_Web/noticias/2005/03/2005031005.htm
Rule Uruguay 2005 only - Mar 27 2:00 0 -
# From Eduardo Cota (2005-09-27):
# http://www.presidencia.gub.uy/_Web/decretos/2005/09/CM%20119_09%2009%202005_00001.PDF
# This means that from 2005-10-09 at 02:00 local time, until 2006-03-12 at
# 02:00 local time, official time in Uruguay will be at GMT -2.
Rule Uruguay 2005 only - Oct
9 2:00 1:00 S
Rule Uruguay 2006 only - Mar 12 2:00 0 -
# From Jesper Norgaard Welen (2006-09-06):
# http://www.presidencia.gub.uy/_web/decretos/2006/09/CM%20210_08%2006%202006_00001.PDF
Rule Uruguay 2006 max - Oct Sun>=1 2:00 1:00 S
Rule Uruguay 2007 max - Mar Sun>=8 2:00 0 -
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Montevideo -3:44:44 - LMT 1898 Jun 28
-3:44:44 - MMT 1920 May 1 # Montevideo MT
-3:30 Uruguay UY%sT 1942 Dec 14 # Uruguay Time
-3:00 Uruguay UY%sT
```

```
# Venezuela
```

```
#
```

```
# From John Stainforth (2007-11-28):
# ... the change for Venezuela originally expected for 2007-12-31 has
# been brought forward to 2007-12-09. The official announcement was
# published today in the "Gaceta Oficial de la Republica Bolivariana
# de Venezuela, numero 38.819" (official document for all laws or
# resolution publication)
# http://www.globovision.com/news.php?nid=72208
```

```
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
```

```
Zone America/Caracas -4:27:44 - LMT 1890
```

```
-4:27:40
```

```
- CMT 1912 Feb 12 # Caracas Mean Time?
```

```
-4:30 - VET 1965 # Venezuela Time
```

```
-4:00 - VET 2007 Dec 9 03:00
```

```
-4:30 - VET
```

```
Found in path(s):
```

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/southamerica
```

No license file was found, but licenses were detected in source scan.

```
/*
 * Copyright 2003-2004 Sun Microsystems, Inc. All Rights Reserved.
 * DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
 *
 * This code is free software; you can redistribute it and/or modify it
 * under the terms of the GNU General Public License version 2 only, as
 * published by the Free Software Foundation. Sun designates this
 * particular file as subject to the "Classpath" exception as provided
 * by Sun in the LICENSE file that accompanied this code.
 *
 * This code is distributed in the hope that it will be useful, but WITHOUT
 * ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
 * FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
 * version 2 for more details (a copy is included in the LICENSE file that
 * accompanied this code).
 *
 * You should have received a copy of the GNU General Public License version
 * 2 along with this work; if not, write to
 * the Free Software Foundation,
 * Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
 *
 * Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
 * CA 95054 USA or visit www.sun.com if you need additional information or
 * have any questions.
 */
```

Found in path(s):

```
 * /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
 2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/util/calendar/BaseCalendar.java
 * /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
 2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCG/sun/util/calendar/AbstractCalendar.java
No license file was found, but licenses were detected in source scan.
```

```
# <pre>
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.

# These entries are mostly present for historical reasons, so that
# people in areas not otherwise covered by the tz files could "zic -l"
# to a time zone that was right for their area. These days, the
# tz files cover almost all the inhabited world, and the only practical
# need now for the entries that are not on UTC are for ships at sea
# that cannot use POSIX TZ settings.
```

```
Zone Etc/GMT 0 - GMT
Zone Etc/UTC 0 - UTC
```

Zone Etc/UCT 0 - UCT

The following link uses older naming conventions,
but it belongs here, not in the file `backward`,
as functions like gmtime load the "GMT" file to handle leap seconds properly.
We want this to work even on installations that omit the other older names.

Link Etc/GMT GMT

Link Etc/UTC Etc/Universal

Link Etc/UTC Etc/Zulu

Link Etc/GMT Etc/Greenwich

Link Etc/GMT Etc/GMT-0

Link Etc/GMT Etc/GMT+0

Link Etc/GMT Etc/GMT0

#

We use POSIX-style signs in the Zone names and the output abbreviations,
even though this is the opposite of what many people expect.
POSIX has positive signs west of Greenwich, but many people expect
positive signs east of Greenwich. For example, TZ='Etc/GMT+4' uses
the abbreviation "GMT+4" and corresponds to 4 hours behind UTC
(i.e. west of Greenwich) even though many people would expect it to
mean 4 hours ahead of UTC (i.e. east of Greenwich).

#

In the draft 5 of POSIX 1003.1-200x, the angle bracket notation allows for
TZ='<GMT-4>+4'; if you want time zone abbreviations conforming to
ISO 8601 you can use TZ='<-0400>+4'. Thus the commonly-expected
offset is kept within the angle bracket (and is used for display)
while the POSIX sign is kept outside the angle bracket (and is used
for calculation).

#

Do not use a TZ setting like TZ='GMT+4', which is four hours behind
GMT but uses the completely
misleading abbreviation "GMT".

Earlier incarnations of this package were not POSIX-compliant,
and had lines such as

Zone GMT-12 -12 - GMT-1200

We did not want things to change quietly if someone accustomed to the old
way does a

zic -l GMT-12

so we moved the names into the Etc subdirectory.

Zone Etc/GMT-14 14 - GMT-14 # 14 hours ahead of GMT

Zone Etc/GMT-13 13 - GMT-13

Zone Etc/GMT-12 12 - GMT-12

Zone Etc/GMT-11 11 - GMT-11

Zone Etc/GMT-10 10 - GMT-10
Zone Etc/GMT-9 9 - GMT-9
Zone Etc/GMT-8 8 - GMT-8
Zone Etc/GMT-7 7 - GMT-7
Zone Etc/GMT-6 6 - GMT-6
Zone Etc/GMT-5 5 - GMT-5
Zone Etc/GMT-4 4 - GMT-4
Zone Etc/GMT-3 3 - GMT-3
Zone Etc/GMT-2 2 - GMT-2
Zone Etc/GMT-1 1 - GMT-1
Zone Etc/GMT+1 -1 - GMT+1
Zone Etc/GMT+2 -2 - GMT+2
Zone Etc/GMT+3 -3 - GMT+3
Zone Etc/GMT+4 -4 - GMT+4
Zone Etc/GMT+5 -5 - GMT+5
Zone Etc/GMT+6 -6 - GMT+6
Zone Etc/GMT+7 -7 - GMT+7
Zone Etc/GMT+8 -8 - GMT+8
Zone Etc/GMT+9 -9 - GMT+9
Zone Etc/GMT+10 -10 - GMT+10
Zone Etc/GMT+11 -11 - GMT+11
Zone Etc/GMT+12 -12 - GMT+12

Found

in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/etcetera

No license file was found, but licenses were detected in source scan.

<pre>

This file is in the public domain, so clarified as of

2009-05-17 by Arthur David Olson.

also includes Central America and the Caribbean

This data is by no means authoritative; if you think you know better,

go ahead and edit the file (and please send any changes to

tz@iana.org for general use in the future).

From Paul Eggert (1999-03-22):

A reliable and entertaining source about time zones is

Derek Howse, Greenwich time and longitude, Philip Wilson Publishers (1997).

#####

United States

From Paul Eggert (1999-03-31):

Howse writes (pp 121-125) that time zones were invented by
Professor Charles Ferdinand Dowd (1825-1904),
Principal of Temple Grove Ladies' Seminary (Saratoga Springs, NY).
His pamphlet ``A System of National Time for Railroads" (1870)
was the result of his proposals at the Convention of
Railroad Trunk Lines
in New York City (1869-10). His 1870 proposal was based on Washington, DC,
but in 1872-05 he moved the proposed origin to Greenwich.
His proposal was adopted by the railroads on 1883-11-18 at 12:00,
and the most of the country soon followed suit.

From Paul Eggert (2005-04-16):
That 1883 transition occurred at 12:00 new time, not at 12:00 old time.
See p 46 of David Prerau, Seize the daylight, Thunder's Mouth Press (2005).

From Paul Eggert (2006-03-22):
A good source for time zone historical data in the US is
Thomas G. Shanks, The American Atlas (5th edition),
San Diego: ACS Publications, Inc. (1991).
Make sure you have the errata sheet; the book is somewhat useless without it.
It is the source for most of the pre-1991 US entries below.

From Paul Eggert (2001-03-06):
Daylight Saving Time was first suggested as a joke by Benjamin Franklin
in his whimsical essay ``An Economical Project for Diminishing the Cost
of Light" published
in the Journal de Paris (1784-04-26).

Not everyone is happy with the results:

#

I don't really care how time is reckoned so long as there is some
agreement about it, but I object to being told that I am saving
daylight when my reason tells me that I am doing nothing of the kind.
I even object to the implication that I am wasting something
valuable if I stay in bed after the sun has risen. As an admirer
of moonlight I resent the bossy insistence of those who want to
reduce my time for enjoying it. At the back of the Daylight Saving
scheme I detect the bony, blue-fingered hand of Puritanism, eager
to push people into bed earlier, and get them up earlier, to make
them healthy, wealthy and wise in spite of themselves.

#

-- Robertson Davies, The diary of Samuel Marchbanks,

Clarke, Irwin (1947), XIX, Sunday

#

For more about the first ten years of DST in the United States, see
Robert Garland's
Ten years of

daylight saving from the Pittsburgh standpoint

(Carnegie Library of Pittsburgh, 1927).

Shanks says that DST was called "War Time" in the US in 1918 and 1919.
However, DST was imposed by the Standard Time Act of 1918, which
was the first nationwide legal time standard, and apparently
time was just called "Standard Time" or "Daylight Saving Time".

From Arthur David Olson:
US Daylight Saving Time ended on the last Sunday of *October* in 1974.
See, for example, the front page of the Saturday, 1974-10-26
and Sunday, 1974-10-27 editions of the Washington Post.

From Arthur David Olson:
Before the Uniform Time Act of 1966 took effect in 1967, observance of
Daylight Saving Time in the US was by local option, except during wartime.

From Arthur David Olson (2000-09-25):
Last night I heard part of a rebroadcast of a 1945 Arch Oboler radio drama.
In the introduction, Oboler spoke of "Eastern Peace Time."
An AltaVista search turned up

"When the time is announced over the radio now, it is 'Eastern Peace
Time' instead of the old familiar 'Eastern War Time.' Peace is wonderful."
 (August 1945) by way of confirmation.

From Joseph Gallant citing
George H. Douglas, The Early Days of Radio Broadcasting (1987):
At 7 P.M. (Eastern War Time) [on 1945-08-14], the networks were set
to switch to London for Attlee's address, but the American people
never got to hear his speech live. According to one press account,
CBS' Bob Trout was first to announce the word of Japan's surrender,
but a few seconds later, NBC, ABC and Mutual also flashed the word
of surrender, all of whom interrupting the bells of Big Ben in
London which were to precede Mr. Attlee's speech.

From Paul Eggert (2003-02-09): It was Robert St John, not Bob Trout. From
Myrna Oliver's obituary of St John on page B16 of today's Los Angeles Times:

... a war-weary U.S. clung to radios, awaiting word of
Japan's surrender.
Any announcement from Asia would reach St. John's New York newsroom on a
wire service teletype machine, which had prescribed signals for major news.
Associated Press, for example, would ring five bells before spewing out
typed copy of an important story, and 10 bells for news "of transcendental
importance."

On Aug. 14, stalling while talking steadily into the NBC networks' open
microphone, St. John heard five bells and waited only to hear a sixth bell,

```
# before announcing confidently: "Ladies and gentlemen, World War II is over.
# The Japanese have agreed to our surrender terms."
#
# He had scored a 20-second scoop on other broadcasters.
```

```
# From Arthur David Olson (2005-08-22):
# Paul has been careful to use the "US" rules only in those locations
# that are part of the United States; this reflects the real scope of
# U.S. government action. So even though the "US" rules have changed
# in the latest release, other countries won't be affected.
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
```

```
Rule US 1918 1919 - Mar lastSun 2:00 1:00 D
```

```
Rule US 1918 1919 - Oct lastSun 2:00 0 S
```

```
Rule US 1942 only - Feb 9 2:00 1:00 W
```

```
# War
```

```
Rule US 1945 only - Aug 14 23:00u 1:00 P # Peace
```

```
Rule US 1945 only - Sep 30 2:00 0 S
```

```
Rule US 1967 2006 - Oct lastSun 2:00 0 S
```

```
Rule US 1967 1973 - Apr lastSun 2:00 1:00 D
```

```
Rule US 1974 only - Jan 6 2:00 1:00 D
```

```
Rule US 1975 only - Feb 23 2:00 1:00 D
```

```
Rule US 1976 1986 - Apr lastSun 2:00 1:00 D
```

```
Rule US 1987 2006 - Apr Sun>=1 2:00 1:00 D
```

```
Rule US 2007 max - Mar Sun>=8 2:00 1:00 D
```

```
Rule US 2007 max - Nov Sun>=1 2:00 0 S
```

```
# From Arthur David Olson, 2005-12-19
```

```
# We generate the files specified below to guard against old files with
# obsolete information being left in the time zone binary directory.
```

```
# We limit the list to names that have appeared in previous versions of
# this time zone package.
```

```
# We do these as separate Zones rather than as Links to avoid problems if
# a particular place changes whether it observes DST.
```

```
# We put
```

```
these specifications here in the northamerica file both to
```

```
# increase the chances that they'll actually get compiled and to
```

```
# avoid the need to duplicate the US rules in another file.
```

```
# Zone NAME GMTTOFF RULES FORMAT [UNTIL]
```

```
Zone EST -5:00 - EST
```

```
Zone MST -7:00 - MST
```

```
Zone HST -10:00 - HST
```

```
Zone EST5EDT -5:00 US E%sT
```

```
Zone CST6CDT -6:00 US C%sT
```

```
Zone MST7MDT -7:00 US M%sT
```

```
Zone PST8PDT -8:00 US P%sT
```

From Bob Devine (1988-01-28):
...Alaska (and Hawaii) had the timezone names changed in 1967.
old new
Pacific Standard Time(PST) -same-
Yukon Standard Time(YST) -same-
Central Alaska S.T. (CAT) Alaska-Hawaii Standard Time (AHST)
Nome Standard Time (NT) Bering Standard Time (BST)

...Alaska's timezone lines were redrawn in 1983 to give only 2 tz.
The YST zone now covers nearly all of the state, AHST just part
of the Aleutian islands. No DST.

From Paul Eggert (1995-12-19):
The tables below use `NST`, not `NT`, for Nome Standard
Time.
I invented `CAWT` for Central Alaska War Time.

From U. S. Naval Observatory (1989-01-19):
USA EASTERN 5 H BEHIND UTC NEW YORK, WASHINGTON
USA EASTERN 4 H BEHIND UTC APR 3 - OCT 30
USA CENTRAL 6 H BEHIND UTC CHICAGO, HOUSTON
USA CENTRAL 5 H BEHIND UTC APR 3 - OCT 30
USA MOUNTAIN 7 H BEHIND UTC DENVER
USA MOUNTAIN 6 H BEHIND UTC APR 3 - OCT 30
USA PACIFIC 8 H BEHIND UTC L.A., SAN FRANCISCO
USA PACIFIC 7 H BEHIND UTC APR 3 - OCT 30
USA ALASKA STD 9 H BEHIND UTC MOST OF ALASKA (AKST)
USA ALASKA STD 8 H BEHIND UTC APR 3 - OCT 30 (AKDT)
USA ALEUTIAN 10 H BEHIND UTC ISLANDS WEST OF 170W
USA - " - 9 H BEHIND UTC APR 3 - OCT 30
USA HAWAII 10 H BEHIND UTC
USA BERING 11 H BEHIND UTC SAMOA, MIDWAY

From Arthur David Olson (1989-01-21):
The above dates are for 1988.
Note the "AKST" and "AKDT" abbreviations,
the claim that there's
no DST in Samoa, and the claim that there is DST in Alaska and the
Aleutians.

From Arthur David Olson (1988-02-13):
Legal standard time zone names, from United States Code (1982 Edition and
Supplement III), Title 15, Chapter 6, Section 260 and forward. First, names
up to 1967-04-01 (when most provisions of the Uniform Time Act of 1966
took effect), as explained in sections 263 and 261:
(none)
United States standard eastern time
United States standard mountain time

United States standard central time
United States standard Pacific time
(none)
United States standard Alaska time
(none)
Next, names from 1967-04-01 until 1983-11-30 (the date for
public law 98-181):
Atlantic standard time
eastern standard time
central standard time
mountain standard time
Pacific standard time
Yukon standard time
Alaska-Hawaii standard time
Bering standard time
And after 1983-11-30:
Atlantic standard time
eastern standard time
central
standard time
mountain standard time
Pacific standard time
Alaska standard time
Hawaii-Aleutian standard time
Samoa standard time
The law doesn't give abbreviations.

From Paul Eggert (2000-01-08), following a heads-up from Rives McDow:
Public law 106-564 (2000-12-23) introduced the abbreviation
"Chamorro Standard Time" for time in Guam and the Northern Marianas.
See the file "australasia".

From Arthur David Olson, 2005-08-09
The following was signed into law on 2005-08-08.

H.R. 6, Energy Policy Act of 2005, SEC. 110. DAYLIGHT SAVINGS.
(a) Amendment- Section 3(a) of the Uniform Time Act of 1966 (15
U.S.C. 260a(a)) is amended--
(1) by striking `first Sunday of April' and inserting `second
Sunday of March'; and
(2) by striking `last Sunday of October' and inserting `first
Sunday of November'.
(b) Effective Date- Subsection (a) shall take effect 1 year after the
date of enactment of this Act or March 1, 2007,
whichever is later.
(c) Report to Congress- Not later than 9 months after the effective
date stated in subsection (b), the Secretary shall report to Congress
on the impact of this section on energy consumption in the United

```

# States.
# (d) Right to Revert- Congress retains the right to revert the
# Daylight Saving Time back to the 2005 time schedules once the
# Department study is complete.

# US eastern time, represented by New York

# Connecticut, Delaware, District of Columbia, most of Florida,
# Georgia, southeast Indiana (Dearborn and Ohio counties), eastern Kentucky
# (except America/Kentucky/Louisville below), Maine, Maryland, Massachusetts,
# New Hampshire, New Jersey, New York, North Carolina, Ohio,
# Pennsylvania, Rhode Island, South Carolina, eastern Tennessee,
# Vermont, Virginia, West Virginia

# From Dave Cantor (2004-11-02):
# Early this summer I had the occasion to visit the Mount Washington
# Observatory weather station atop (of course!) Mount Washington
# [, NH]....
# One of the staff members said that the station was on Eastern Standard Time
# and didn't change their clocks for Daylight Saving ... so that their
# reports will always have times which are 5 hours behind UTC.

# From Paul Eggert (2005-08-26):
# According to today's Huntsville Times
# <http://www.al.com/news/huntsvilletimes/index.ssf?/base/news/1125047783228320.xml&coll=1>
# a few towns on Alabama's "eastern border with Georgia, such as Phenix City
# in Russell County, Lanett in Chambers County and some towns in Lee County,
# set their watches and clocks on Eastern time." It quotes H.H. "Bubba"
# Roberts, city administrator in Phenix City. as saying "We are in the Central
# time zone, but we do go by the Eastern time zone because so many people work
# in Columbus."

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
Rule NYC 1920 only - Mar lastSun 2:00 1:00 D
Rule NYC 1920 only - Oct lastSun 2:00 0 S
Rule NYC 1921 1966 - Apr lastSun 2:00 1:00 D
Rule NYC 1921 1954 - Sep lastSun 2:00 0 S
Rule NYC 1955 1966 - Oct lastSun 2:00 0 S
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/New_York -4:56:02 - LMT 1883 Nov 18 12:03:58
-5:00 US E%sT 1920
-5:00 NYC E%sT 1942
-5:00 US E%sT 1946
-5:00 NYC E%sT 1967
-5:00 US E%sT

# US central time, represented by Chicago

```

Alabama, Arkansas, Florida panhandle (Bay, Calhoun, Escambia,
Gulf, Holmes, Jackson, Okaloosa, Santa Rosa, Walton, and
Washington counties), Illinois, western Indiana
(Gibson, Jasper, Lake, LaPorte, Newton, Porter, Posey, Spencer,
Vanderburgh, and Warrick counties), Iowa, most of Kansas, western
Kentucky, Louisiana, Minnesota, Mississippi, Missouri, eastern
Nebraska, eastern North Dakota, Oklahoma, eastern South Dakota,
western Tennessee, most of Texas, Wisconsin

From Larry M. Smith (2006-04-26) re Wisconsin:
<http://www.legis.state.wi.us/statutes/Stat0175.pdf> ...
is currently enforced at the 01:00 time of change. Because the local
"bar time" in the state
corresponds to 02:00, a number of citations
are issued for the "sale of class 'B' alcohol after prohibited
hours" within the deviated hour of this change every year....
#

From Douglas R. Bomberg (2007-03-12):
Wisconsin has enacted (nearly eleventh-hour) legislation to get WI
Statue 175 closer in synch with the US Congress' intent....
<http://www.legis.state.wi.us/2007/data/acts/07Act3.pdf>

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER

Rule Chicago 1920 only - Jun 13 2:00 1:00 D

Rule Chicago 1920 1921 - Oct lastSun 2:00 0 S

Rule Chicago 1921 only - Mar lastSun 2:00 1:00 D

Rule Chicago 1922 1966 - Apr lastSun 2:00 1:00 D

Rule Chicago 1922 1954 - Sep lastSun 2:00 0 S

Rule Chicago 1955 1966 - Oct lastSun 2:00 0 S

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Chicago -5:50:36 - LMT 1883 Nov 18 12:09:24

-6:00 US C%sT 1920

-6:00 Chicago C%sT 1936 Mar 1 2:00

-5:00 - EST 1936 Nov 15 2:00

-6:00 Chicago C%sT 1942

-6:00 US C%sT 1946

-6:00 Chicago C%sT 1967

-6:00 US C%sT

#

Oliver County, ND switched from mountain to central time on 1992-10-25.

Zone America/North_Dakota/Center -6:45:12 - LMT 1883 Nov 18 12:14:48

-7:00 US M%sT 1992 Oct 25 02:00

-6:00 US C%sT

Morton County, ND, switched from mountain to central time on

2003-10-26, except for the area around Mandan which was already central time.

See <<http://dmses.dot.gov/docimages/p63/135818.pdf>>.

Officially this switch also included part of Sioux County, and

Jones, Mellette, and Todd Counties in South Dakota;
but in practice these other counties were already observing central time.
See <<http://www.epa.gov/fedrgstr/EPA-IMPACT/2003/October/Day-28/i27056.htm>>.
Zone America/North_Dakota/New_Salem -6:45:39 - LMT 1883 Nov 18 12:14:21
-7:00 US M%sT 2003 Oct 26 02:00
-6:00 US C%sT

From Josh Findley (2011-01-21):
...it appears that Mercer County, North Dakota, changed from the
mountain time zone to the central time zone at the last transition from
daylight-saving
to standard time (on Nov. 7, 2010):

<http://www.gpo.gov/fdsys/pkg/FR-2010-09-29/html/2010-24376.htm>

http://www.bismarcktribune.com/news/local/article_1eb1b588-c758-11df-b472-001cc4c03286.html

From Andy Lipscomb (2011-01-24):
...according to the Census Bureau, the largest city is Beulah (although
it's commonly referred to as Beulah-Hazen, with Hazen being the next
largest city in Mercer County). Google Maps places Beulah's city hall
at 4715'51" north, 10146'40" west, which yields an offset of 6h47'07".

Zone America/North_Dakota/Beulah -6:47:07 - LMT 1883 Nov 18 12:12:53
-7:00 US M%sT 2010 Nov 7 2:00
-6:00 US C%sT

US mountain time, represented by Denver

Colorado, far western Kansas, Montana, western
Nebraska, Nevada border (Jackpot, Owyhee, and Mountain City),
New
Mexico, southwestern North Dakota,
western South Dakota, far western Texas (El Paso County, Hudspeth County,
and Pine Springs and Nickel Creek in Culberson County), Utah, Wyoming

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
Rule Denver 1920 1921 - Mar lastSun 2:00 1:00 D
Rule Denver 1920 only - Oct lastSun 2:00 0 S
Rule Denver 1921 only - May 22 2:00 0 S
Rule Denver 1965 1966 - Apr lastSun 2:00 1:00 D
Rule Denver 1965 1966 - Oct lastSun 2:00 0 S
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Denver -6:59:56 - LMT 1883 Nov 18 12:00:04
-7:00 US M%sT 1920
-7:00 Denver M%sT 1942

-7:00 US M%sT 1946
-7:00 Denver M%sT 1967
-7:00 US M%sT

US Pacific time, represented by Los Angeles

California, northern Idaho (Benewah, Bonner, Boundary, Clearwater,
Idaho, Kootenai, Latah, Lewis, Nez Perce, and Shoshone counties,
and the northern three-quarters of Idaho county),
most of Nevada, most of Oregon, and Washington

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
Rule CA 1948 only - Mar 14 2:00 1:00 D
Rule CA 1949 only - Jan
1 2:00 0 S
Rule CA 1950 1966 - Apr lastSun 2:00 1:00 D
Rule CA 1950 1961 - Sep lastSun 2:00 0 S
Rule CA 1962 1966 - Oct lastSun 2:00 0 S
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Los_Angeles -7:52:58 - LMT 1883 Nov 18 12:07:02
-8:00 US P%sT 1946
-8:00 CA P%sT 1967
-8:00 US P%sT

Alaska
AK%sT is the modern abbreviation for -9:00 per USNO.

From Paul Eggert (2001-05-30):
Howse writes that Alaska switched from the Julian to the Gregorian calendar,
and from east-of-GMT to west-of-GMT days, when the US bought it from Russia.
This was on 1867-10-18, a Friday; the previous day was 1867-10-06 Julian,
also a Friday. Include only the time zone part of this transition,
ignoring the switch from Julian to Gregorian, since we can't represent
the Julian calendar.

As far as we know, none of the exact locations mentioned below were
permanently inhabited in 1867 by anyone using either calendar.

(Yakutat was colonized by the Russians in 1799, but the settlement
was destroyed in 1805 by a Yakutat-kon war party.) However, there
were nearby inhabitants in some cases and for our purposes perhaps
it's best to simply use the official transition.

From Steve Ferguson (2011-01-31):
The author lives in Alaska and many of the references listed are only
available to Alaskan residents.
#

```
# <a
href="http://www.alaskahistoricalsociety.org/index.cfm?section=discover%20alaska&page=Glimpses%20of%20the
%20Past&viewpost=2&ContentId=98">
#
http://www.alaskahistoricalsociety.org/index.cfm?section=discover%20alaska&page=Glimpses%20of%20the%20P
ast&viewpost=2&ContentId=98
# </a>
```

```
# From Arthur David Olson (2011-02-01):
# Here's database-relevant material from the 2001 "Alaska History" article:
#
# On September 20 [1979]...DOT...officials decreed that on April 27,
# 1980, Juneau and other nearby communities would move to Yukon Time.
# Sitka, Petersburg, Wrangell, and Ketchikan, however,
# would remain on
# Pacific Time.
#
# ...on September 22, 1980, DOT Secretary Neil E. Goldschmidt rescinded the
# Department's September 1979 decision. Juneau and other communities in
# northern Southeast reverted to Pacific Time on October 26.
#
# On October 28 [1983]...the Metlakatla Indian Community Council voted
# unanimously to keep the reservation on Pacific Time.
#
# According to DOT official Joanne Petrie, Indian reservations are not
# bound to follow time zones imposed by neighboring jurisdictions.
#
# (The last is consistent with how the database now handles the Navajo
# Nation.)
```

```
# From Arthur David Olson (2011-02-09):
# I just spoke by phone with a staff member at the Metlakatla Indian
# Community office (using contact information available at
# <a href="http://www.commerce.state.ak.us/dca/commdb/CIS.cfm?Comm_Boro_name=Metlakatla">
# http://www.commerce.state.ak.us/dca/commdb/CIS.cfm?Comm_Boro_name=Metlakatla
# </a>).
# It's shortly after 1:00 here on the east coast of
# the United States;
# the staffer said it was shortly after 10:00 there. When I asked whether
# that meant they were on Pacific time, they said no--they were on their
# own time. I asked about daylight saving; they said it wasn't used. I
# did not inquire about practices in the past.
```

```
# From Arthur David Olson (2011-08-17):
# For lack of better information, assume that Metlakatla's
# abandonment of use of daylight saving resulted from the 1983 vote.
```

```
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
```

Zone America/Juneau 15:02:19 - LMT 1867 Oct 18

-8:57:41 - LMT 1900 Aug 20 12:00
-8:00 - PST 1942
-8:00 US P%ST 1946
-8:00 - PST 1969
-8:00 US P%ST 1980 Apr 27 2:00
-9:00 US Y%ST 1980 Oct 26 2:00
-8:00 US P%ST 1983 Oct 30 2:00
-9:00 US Y%ST 1983 Nov 30
-9:00 US AK%ST

Zone America/Sitka 14:58:47 - LMT 1867 Oct 18

-9:01:13 - LMT 1900 Aug 20 12:00
-8:00 - PST 1942
-8:00 US P%ST 1946
-8:00 - PST 1969
-8:00 US P%ST 1983 Oct 30 2:00
-9:00 US Y%ST 1983

Nov 30

-9:00 US AK%ST

Zone America/Metlakatla 15:13:42 - LMT 1867 Oct 18

-8:46:18 - LMT 1900 Aug 20 12:00
-8:00 - PST 1942
-8:00 US P%ST 1946
-8:00 - PST 1969
-8:00 US P%ST 1983 Oct 30 2:00
-8:00 - MeST

Zone America/Yakutat 14:41:05 - LMT 1867 Oct 18

-9:18:55 - LMT 1900 Aug 20 12:00
-9:00 - YST 1942
-9:00 US Y%ST 1946
-9:00 - YST 1969
-9:00 US Y%ST 1983 Nov 30
-9:00 US AK%ST

Zone America/Anchorage 14:00:24 - LMT 1867 Oct 18

-9:59:36 - LMT 1900 Aug 20 12:00
-10:00 - CAT 1942
-10:00 US CAT/CAWT 1945 Aug 14 23:00u
-10:00 US CAT/CAPT 1946 # Peace
-10:00 - CAT 1967 Apr
-10:00 - AHST 1969
-10:00 US AH%ST 1983 Oct 30 2:00
-9:00 US Y%ST 1983 Nov 30
-9:00 US AK%ST

Zone America/Nome 12:58:21 - LMT 1867 Oct 18

-11:01:38 - LMT 1900 Aug 20 12:00
-11:00 - NST 1942
-11:00 US N%ST 1946
-11:00 - NST 1967 Apr

-11:00 - BST 1969
-11:00 US B%ST 1983 Oct 30 2:00
-9:00 US Y%ST 1983 Nov 30
-9:00 US AK%ST

Zone

America/Adak 12:13:21 - LMT 1867 Oct 18

-11:46:38 - LMT 1900 Aug 20 12:00
-11:00 - NST 1942
-11:00 US N%ST 1946
-11:00 - NST 1967 Apr
-11:00 - BST 1969
-11:00 US B%ST 1983 Oct 30 2:00
-10:00 US AH%ST 1983 Nov 30
-10:00 US HA%ST

The following switches don't quite make our 1970 cutoff.

#

Shanks writes that part of southwest Alaska (e.g. Aniak)
switched from -11:00 to -10:00 on 1968-09-22 at 02:00,
and another part (e.g. Akiak) made the same switch five weeks later.

#

From David Flater (2004-11-09):

In e-mail, 2004-11-02, Ray Hudson, historian/liaison to the Unalaska
Historic Preservation Commission, provided this information, which
suggests that Unalaska deviated from statutory time from early 1967
possibly until 1983:

#

Minutes of the Unalaska City Council Meeting, January 10, 1967:
"Except for St. Paul and Akutan, Unalaska is the only important
location not on Alaska Standard Time. The following resolution was
made
by William Robinson and seconded by Henry Swanson: Be it
resolved that the City of Unalaska hereby goes to Alaska Standard
Time as of midnight Friday, January 13, 1967 (1 A.M. Saturday,
January 14, Alaska Standard Time.) This resolution was passed with
three votes for and one against."

Hawaii

From Arthur David Olson (2010-12-09):

"Hawaiian Time" by Robert C. Schmitt and Doak C. Cox appears on pages 207-225
of volume 26 of The Hawaiian Journal of History (1992). As of 2010-12-09,
the article is available at

http://evols.library.manoa.hawaii.edu/bitstream/10524/239/2/JL26215.pdf

and indicates that standard time was adopted effective noon, January
13, 1896 (page 218), that in "1933, the Legislature decreed daylight
saving for the period between the last Sunday of each April and the

last Sunday of each September, but less than a month later repealed the
act,"

(page 220), that year-round daylight saving time was in effect
from 1942-02-09 to 1945-09-30 (page 221, with no time of day given for
when clocks changed) and that clocks were changed by 30 minutes
effective the second Sunday of June, 1947 (page 219, with no time of
day given for when clocks changed). A footnote for the 1933 changes
cites Session Laws of Hawaii 1933, "Act. 90 (approved 26 Apr. 1933)
and Act 163 (approved 21 May 1933)."

From Arthur David Olson (2011-01-19):

The following is from "Laws of the Territory of Hawaii Passed by the
Seventeenth Legislature: Regular Session 1933," available (as of
2011-01-19) at American University's Pence Law Library. Page 85: "Act
90...At 2 o'clock ante meridian of the last Sunday in April of each
year, the standard time of this Territory shall be advanced one
hour...This Act shall take effect upon its approval. Approved this 26th
day of April, A. D. 1933. LAWRENCE M JUDD, Governor of the Territory of
Hawaii." Page

172: "Act 163...Act 90 of the Session Laws of 1933 is
hereby repealed...This Act shall take effect upon its approval, upon
which date the standard time of this Territory shall be restored to
that existing immediately prior to the taking effect of said Act 90.
Approved this 21st day of May, A. D. 1933. LAWRENCE M. JUDD, Governor
of the Territory of Hawaii."

#

Note that 1933-05-21 was a Sunday.

We're left to guess the time of day when Act 163 was approved; guess noon.

Zone Pacific/Honolulu -10:31:26 - LMT 1896 Jan 13 12:00 #Schmitt&Cox

-10:30 - HST 1933 Apr 30 2:00 #Laws 1933

-10:30 1:00 HDT 1933 May 21 12:00 #Laws 1933+12

-10:30 - HST 1942 Feb 09 2:00 #Schmitt&Cox+2

-10:30 1:00 HDT 1945 Sep 30 2:00 #Schmitt&Cox+2

-10:30 - HST 1947 Jun 8 2:00 #Schmitt&Cox+2

-10:00 - HST

Now we turn to US areas that have diverged from the consensus since 1970.

Arizona mostly uses MST.

From Paul Eggert (2002-10-20):

#

The information in the rest of this paragraph
is derived from the

<http://www.dlapr.lib.az.us/links/daylight.htm>

Daylight Saving Time web page (2002-01-23) maintained by the

Arizona State Library, Archives and Public Records.

Between 1944-01-01 and 1944-04-01 the State of Arizona used standard
time, but by federal law railroads, airlines, bus lines, military
personnel, and some engaged in interstate commerce continued to
observe war (i.e., daylight saving) time. The 1944-03-17 Phoenix
Gazette says that was the date the law changed, and that 04-01 was
the date the state's clocks would change. In 1945 the State of
Arizona used standard time all year, again with exceptions only as
mandated by federal law. Arizona observed DST in 1967, but Arizona
Laws 1968, ch. 183 (effective 1968-03-21) repealed DST.

Shanks says the 1944 experiment came to an end on 1944-03-17.
Go with the Arizona State Library instead.

Zone America/Phoenix -7:28:18 - LMT 1883 Nov 18 11:31:42

-7:00 US M%ST 1944

Jan 1 00:01

-7:00 - MST 1944 Apr 1 00:01

-7:00 US M%ST 1944 Oct 1 00:01

-7:00 - MST 1967

-7:00 US M%ST 1968 Mar 21

-7:00 - MST

From Arthur David Olson (1988-02-13):

A writer from the Inter Tribal Council of Arizona, Inc.,

notes in private correspondence dated 1987-12-28 that "Presently, only the

Navajo Nation participates in the Daylight Saving Time policy, due to its

large size and location in three states." (The "only" means that other

tribal nations don't use DST.)

Link America/Denver America/Shiprock

Southern Idaho (Ada, Adams, Bannock, Bear Lake, Bingham, Blaine,
Boise, Bonneville, Butte, Camas, Canyon, Caribou, Cassia, Clark,
Custer, Elmore, Franklin, Fremont, Gem, Gooding, Jefferson, Jerome,
Lemhi, Lincoln, Madison, Minidoka, Oneida, Owyhee, Payette, Power,
Teton, Twin Falls, Valley, Washington counties, and the southern
quarter of Idaho county) and eastern Oregon (most of Malheur County)
switched four weeks late in 1974.

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone

America/Boise -7:44:49 - LMT 1883 Nov 18 12:15:11

-8:00 US P%ST 1923 May 13 2:00

-7:00 US M%ST 1974

-7:00 - MST 1974 Feb 3 2:00

-7:00 US M%ST

Indiana

#

```
# For a map of Indiana's time zone regions, see:
# <a href="http://www.mccsc.edu/time.html">
# What time is it in Indiana?
# </a> (2006-03-01)
#
# From Paul Eggert (2007-08-17):
# Since 1970, most of Indiana has been like America/Indiana/Indianapolis,
# with the following exceptions:
#
# - Gibson, Jasper, Lake, LaPorte, Newton, Porter, Posey, Spencer,
#   Vandenburg, and Warrick counties have been like America/Chicago.
#
# - Dearborn and Ohio counties have been like America/New_York.
#
# - Clark, Floyd, and Harrison counties have been like
#   America/Kentucky/Louisville.
#
# - Crawford, Daviess, Dubois, Knox, Martin, Perry, Pike, Pulaski, Starke,
#   and Switzerland counties have their own time zone histories as noted below.
#
# Shanks partitioned Indiana into 345 regions, each with
# its own time history,
# and wrote ``Even newspaper reports present contradictory information.''
# Those Hoosiers! Such a flighty and changeable people!
# Fortunately, most of the complexity occurred before our cutoff date of 1970.
#
# Other than Indianapolis, the Indiana place names are so nondescript
# that they would be ambiguous if we left them at the `America' level.
# So we reluctantly put them all in a subdirectory `America/Indiana'.
```

From Paul Eggert (2005-08-16):

```
# http://www.mccsc.edu/time.html says that Indiana will use DST starting 2006.
```

From Nathan Stratton Treadway (2006-03-30):

```
# http://www.dot.gov/affairs/dot0406.htm [3705 B]
```

From Deborah Goldsmith (2006-01-18):

```
# http://dmses.dot.gov/docimages/pdf95/382329_web.pdf [2.9 MB]
```

From Paul Eggert (2006-01-20):

```
# It says "DOT is relocating the time zone boundary in Indiana to move Starke,
# Pulaski, Knox, Daviess, Martin, Pike, Dubois, and Perry Counties from the
# Eastern Time Zone to the Central Time Zone.... The
# effective date of
# this rule is 2:00 a.m. EST Sunday, April 2, 2006, which is the
# changeover date from standard time to Daylight Saving Time."
# Strictly speaking, this means the affected counties will change their
# clocks twice that night, but this obviously is in error. The intent
# is that 01:59:59 EST be followed by 02:00:00 CDT.
```

From Gwillim Law (2007-02-10):
The Associated Press has been reporting that Pulaski County, Indiana is
going to switch from Central to Eastern Time on March 11, 2007....
<http://www.indystar.com/apps/pbcs.dll/article?AID=/20070207/LOCAL190108/702070524/0/LOCAL>

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER

Rule Indianapolis 1941 only - Jun 22 2:00 1:00 D

Rule Indianapolis 1941 1954 - Sep lastSun 2:00 0 S

Rule Indianapolis 1946 1954 - Apr lastSun 2:00 1:00 D

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Indiana/Indianapolis -5:44:38 - LMT 1883 Nov 18 12:15:22

-6:00 US C%sT 1920

-6:00 Indianapolis C%sT 1942

-6:00 US C%sT 1946

-6:00

Indianapolis C%sT 1955 Apr 24 2:00

-5:00 - EST 1957 Sep 29 2:00

-6:00 - CST 1958 Apr 27 2:00

-5:00 - EST 1969

-5:00 US E%sT 1971

-5:00 - EST 2006

-5:00 US E%sT

#

Eastern Crawford County, Indiana, left its clocks alone in 1974,

as well as from 1976 through 2005.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER

Rule Marengo 1951 only - Apr lastSun 2:00 1:00 D

Rule Marengo 1951 only - Sep lastSun 2:00 0 S

Rule Marengo 1954 1960 - Apr lastSun 2:00 1:00 D

Rule Marengo 1954 1960 - Sep lastSun 2:00 0 S

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Indiana/Marengo -5:45:23 - LMT 1883 Nov 18 12:14:37

-6:00 US C%sT 1951

-6:00 Marengo C%sT 1961 Apr 30 2:00

-5:00 - EST 1969

-5:00 US E%sT 1974 Jan 6 2:00

-6:00 1:00 CDT 1974 Oct 27 2:00

-5:00 US E%sT 1976

-5:00 - EST 2006

-5:00 US E%sT

#

Daviess, Dubois, Knox, and Martin Counties, Indiana,

switched from eastern to central time in April 2006, then switched back

in November 2007.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER

Rule

Vincennes 1946 only - Apr lastSun 2:00 1:00 D

Rule Vincennes 1946 only - Sep lastSun 2:00 0 S

Rule Vincennes 1953 1954 - Apr lastSun 2:00 1:00 D
 Rule Vincennes 1953 1959 - Sep lastSun 2:00 0 S
 Rule Vincennes 1955 only - May 1 0:00 1:00 D
 Rule Vincennes 1956 1963 - Apr lastSun 2:00 1:00 D
 Rule Vincennes 1960 only - Oct lastSun 2:00 0 S
 Rule Vincennes 1961 only - Sep lastSun 2:00 0 S
 Rule Vincennes 1962 1963 - Oct lastSun 2:00 0 S
 # Zone NAME GMTTOFF RULES FORMAT [UNTIL]
 Zone America/Indiana/Vincennes -5:50:07 - LMT 1883 Nov 18 12:09:53
 -6:00 US C%sT 1946
 -6:00 Vincennes C%sT 1964 Apr 26 2:00
 -5:00 - EST 1969
 -5:00 US E%sT 1971
 -5:00 - EST 2006 Apr 2 2:00
 -6:00 US C%sT 2007 Nov 4 2:00
 -5:00 US E%sT
 #
 # Perry County, Indiana, switched from eastern to central time in April 2006.
 # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
 Rule Perry 1946 only - Apr lastSun 2:00 1:00 D
 Rule Perry 1946 only - Sep lastSun 2:00 0 S
 Rule Perry 1953 1954 - Apr lastSun 2:00 1:00 D
 Rule
 Perry 1953 1959 - Sep lastSun 2:00 0 S
 Rule Perry 1955 only - May 1 0:00 1:00 D
 Rule Perry 1956 1963 - Apr lastSun 2:00 1:00 D
 Rule Perry 1960 only - Oct lastSun 2:00 0 S
 Rule Perry 1961 only - Sep lastSun 2:00 0 S
 Rule Perry 1962 1963 - Oct lastSun 2:00 0 S
 # Zone NAME GMTTOFF RULES FORMAT [UNTIL]
 Zone America/Indiana/Tell_City -5:47:03 - LMT 1883 Nov 18 12:12:57
 -6:00 US C%sT 1946
 -6:00 Perry C%sT 1964 Apr 26 2:00
 -5:00 - EST 1969
 -5:00 US E%sT 1971
 -5:00 - EST 2006 Apr 2 2:00
 -6:00 US C%sT
 #
 # Pike County, Indiana moved from central to eastern time in 1977,
 # then switched back in 2006, then switched back again in 2007.
 # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
 Rule Pike 1955 only - May 1 0:00 1:00 D
 Rule Pike 1955 1960 - Sep lastSun 2:00 0 S
 Rule Pike 1956 1964 - Apr lastSun 2:00 1:00 D
 Rule Pike 1961 1964 - Oct lastSun 2:00 0 S
 # Zone NAME GMTTOFF RULES FORMAT [UNTIL]
 Zone America/Indiana/Petersburg -5:49:07 - LMT 1883

Nov 18 12:10:53
 -6:00 US C%sT 1955
 -6:00 Pike C%sT 1965 Apr 25 2:00
 -5:00 - EST 1966 Oct 30 2:00
 -6:00 US C%sT 1977 Oct 30 2:00
 -5:00 - EST 2006 Apr 2 2:00
 -6:00 US C%sT 2007 Nov 4 2:00
 -5:00 US E%sT
 #
 # Starke County, Indiana moved from central to eastern time in 1991,
 # then switched back in 2006.
 # From Arthur David Olson (1991-10-28):
 # An article on page A3 of the Sunday, 1991-10-27 Washington Post
 # notes that Starke County switched from Central time to Eastern time as of
 # 1991-10-27.
 # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
 Rule Starke 1947 1961 - Apr lastSun 2:00 1:00 D
 Rule Starke 1947 1954 - Sep lastSun 2:00 0 S
 Rule Starke 1955 1956 - Oct lastSun 2:00 0 S
 Rule Starke 1957 1958 - Sep lastSun 2:00 0 S
 Rule Starke 1959 1961 - Oct lastSun 2:00 0 S
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone America/Indiana/Knox -5:46:30 - LMT 1883 Nov 18 12:13:30
 -6:00 US C%sT 1947
 -6:00 Starke C%sT 1962 Apr 29 2:00
 -5:00 - EST 1963 Oct 27 2:00
 -6:00 US C%sT 1991
 Oct 27 2:00
 -5:00 - EST 2006 Apr 2 2:00
 -6:00 US C%sT
 #
 # Pulaski County, Indiana, switched from eastern to central time in
 # April 2006 and then switched back in March 2007.
 # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
 Rule Pulaski 1946 1960 - Apr lastSun 2:00 1:00 D
 Rule Pulaski 1946 1954 - Sep lastSun 2:00 0 S
 Rule Pulaski 1955 1956 - Oct lastSun 2:00 0 S
 Rule Pulaski 1957 1960 - Sep lastSun 2:00 0 S
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone America/Indiana/Winamac -5:46:25 - LMT 1883 Nov 18 12:13:35
 -6:00 US C%sT 1946
 -6:00 Pulaski C%sT 1961 Apr 30 2:00
 -5:00 - EST 1969
 -5:00 US E%sT 1971
 -5:00 - EST 2006 Apr 2 2:00
 -6:00 US C%sT 2007 Mar 11 2:00
 -5:00 US E%sT
 #

Switzerland County, Indiana, did not observe DST from 1973 through 2005.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Indiana/Vevay -5:40:16 - LMT 1883 Nov 18 12:19:44

-6:00 US C%sT 1954 Apr 25 2:00

-5:00 - EST 1969

-5:00 US E%sT 1973

-5:00 - EST 2006

-5:00 US E%sT

#

Part of Kentucky left its clocks alone in 1974.

This also includes Clark, Floyd, and Harrison counties in Indiana.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER

Rule Louisville 1921 only - May 1 2:00 1:00 D

Rule Louisville 1921 only - Sep 1 2:00 0 S

Rule Louisville 1941 1961 - Apr lastSun 2:00 1:00 D

Rule Louisville 1941 only - Sep lastSun 2:00 0 S

Rule Louisville 1946 only - Jun 2 2:00 0 S

Rule Louisville 1950 1955 - Sep lastSun 2:00 0 S

Rule Louisville 1956 1960 - Oct lastSun 2:00 0 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Kentucky/Louisville -5:43:02 - LMT 1883 Nov 18 12:16:58

-6:00 US C%sT 1921

-6:00 Louisville C%sT 1942

-6:00 US C%sT 1946

-6:00 Louisville C%sT 1961 Jul 23 2:00

-5:00 - EST 1968

-5:00 US E%sT 1974 Jan 6 2:00

-6:00 1:00 CDT 1974 Oct 27 2:00

-5:00 US E%sT

#

Wayne County, Kentucky

#

From

Lake Cumberland LIFE

 (1999-01-29)

via WKYM-101.7:

Clinton County has joined Wayne County in asking the DoT to change from

the Central to the Eastern time zone.... The Wayne County government made

the same request in December. And while Russell County officials have not

taken action, the majority of respondents to a poll conducted there in

August indicated they would like to change to "fast time" also.

The three Lake Cumberland counties are the farthest east of any U.S.

location in the Central time zone.

#

From Rich Wales (2000-08-29):

After prolonged debate, and despite continuing deep differences of opinion,

Wayne County (central Kentucky) is switching from Central (-0600) to Eastern
(-0500) time. They won't "fall back" this year. See Sara Shipley,
The difference an hour makes, Nando Times (2000-08-29 15:33 -0400).

From Paul Eggert (2001-07-16):
The final rule was published in the
http://frwebgate.access.gpo.gov/cgi-bin/getdoc.cgi?dbname=2000_register&docid=fr17au00-22>

Federal Register 65, 160 (2000-08-17), page 50154-50158.

Zone America/Kentucky/Monticello -5:39:24 - LMT 1883 Nov 18 12:20:36
-6:00 US C%sT 1946
-6:00 - CST 1968
-6:00 US C%sT 2000 Oct 29 2:00
-5:00 US E%sT

From Rives McDow (2000-08-30):
Here ... are all the changes in the US since 1985.
Kearny County, KS (put all of county on central;
previously split between MST and CST) ... 1990-10
Starke County, IN (from CST to EST) ... 1991-10
Oliver County, ND (from MST to CST) ... 1992-10
West Wendover, NV (from PST TO MST) ... 1999-10
Wayne County, KY (from CST to EST) ... 2000-10

From Paul Eggert (2001-07-17):
We don't know where the line used to be within Kearny County, KS,
so omit that change for now.
See America/Indiana/Knox for the Starke County, IN change.
See America/North_Dakota/Center for the Oliver County, ND change.
West Wendover, NV officially switched from Pacific to mountain time on
1999-10-31. See the
http://frwebgate.access.gpo.gov/cgi-bin/getdoc.cgi?dbname=1999_register&docid=fr21oc99-15>

Federal Register 64, 203 (1999-10-21), page 56705-56707.

However, the Federal Register says that West Wendover already operated
on mountain time, and the rule merely made this official;
hence a separate tz entry is not needed.

Michigan

From Bob Devine (1988-01-28):
Michigan didn't observe DST from 1968 to 1973.

From Paul Eggert (1999-03-31):

```

# Shanks writes that Michigan started using standard time on 1885-09-18,
# but Howse writes (pp 124-125, referring to Popular Astronomy, 1901-01)
# that Detroit kept
#
# local time until 1900 when the City Council decreed that clocks should
# be put back twenty-eight minutes to Central Standard Time. Half the
# city obeyed, half refused. After considerable debate, the decision
# was rescinded and the city reverted to Sun time. A derisive offer to
# erect a sundial in front of the city hall was referred to the
# Committee on Sewers.
    Then, in 1905, Central time was adopted
# by city vote.
#
# This story is too entertaining to be false, so go with Howse over Shanks.
#
# From Paul Eggert (2001-03-06):
# Garland (1927) writes ``Cleveland and Detroit advanced their clocks
# one hour in 1914." This change is not in Shanks. We have no more
# info, so omit this for now.
#
# Most of Michigan observed DST from 1973 on, but was a bit late in 1975.
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
Rule Detroit 1948 only - Apr lastSun 2:00 1:00 D
Rule Detroit 1948 only - Sep lastSun 2:00 0 S
Rule Detroit 1967 only - Jun 14 2:00 1:00 D
Rule Detroit 1967 only - Oct lastSun 2:00 0 S
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Detroit -5:32:11 - LMT 1905
    -6:00 - CST 1915 May 15 2:00
    -5:00 - EST 1942
    -5:00 US E%sT 1946
    -5:00 Detroit E%sT 1973
    -5:00 US E%sT 1975
    -5:00 - EST 1975 Apr 27 2:00
    -5:00 US E%sT
#
# Dickinson, Gogebic, Iron, and Menominee Counties, Michigan,
# switched from EST to CST/CDT in 1973.
#
    Rule NAME FROM TO TYPE IN ON AT SAVE LETTER
Rule Menominee 1946 only - Apr lastSun 2:00 1:00 D
Rule Menominee 1946 only - Sep lastSun 2:00 0 S
Rule Menominee 1966 only - Apr lastSun 2:00 1:00 D
Rule Menominee 1966 only - Oct lastSun 2:00 0 S
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Menominee -5:50:27 - LMT 1885 Sep 18 12:00
    -6:00 US C%sT 1946
    -6:00 Menominee C%sT 1969 Apr 27 2:00

```

-5:00 - EST 1973 Apr 29 2:00

-6:00 US C%sT

Navassa
administered by the US Fish and Wildlife Service
claimed by US under the provisions of the 1856 Guano Islands Act
also claimed by Haiti
occupied 1857/1900 by the Navassa Phosphate Co
US lighthouse 1917/1996-09
currently uninhabited
see Mark Fineman, ``An Isle Rich in Guano and Discord'',
Los Angeles Times (1998-11-10), A1, A10; it cites
Jimmy Skaggs, The Great Guano Rush (1994).

#####

From Paul Eggert (2006-03-22):
A good source
for time zone historical data outside the U.S. is
Thomas G. Shanks and Rique Pottenger, The International Atlas (6th edition),
San Diego: ACS Publications, Inc. (2003).

Gwillim Law writes that a good source
for recent time zone data is the International Air Transport
Association's Standard Schedules Information Manual (IATA SSIM),
published semiannually. Law sent in several helpful summaries
of the IATA's data after 1990.

Except where otherwise noted, Shanks & Pottenger is the source for
entries through 1990, and IATA SSIM is the source for entries afterwards.

Other sources occasionally used include:

Edward W. Whitman, World Time Differences,
Whitman Publishing Co, 2 Niagara Av, Ealing, London (undated),
which I found in the UCLA library.

William Willett, The Waste of Daylight, 19th edition
 (1914-03)

Milne J. Civil time. Geogr J. 1899 Feb;13(2):173-94
<http://www.jstor.org/stable/1774359>.

See the `europe' file for Greenland.

```

# Canada

# From Alain LaBont<e'> (1994-11-14):
# I post here the time zone abbreviations standardized in Canada
# for both English and French in the CAN/CSA-Z234.4-89 standard...
#
# UTC Standard time Daylight savings time
# offset French English French English
# -2:30 - - HAT NDT
# -3 - - HAA ADT
# -3:30 HNT NST - -
# -4 HNA AST HAE EDT
# -5 HNE EST HAC CDT
# -6 HNC CST HAR MDT
# -7 HNR MST HAP PDT
# -8 HNP PST HAY YDT
# -9 HNY YST - -
#
# HN: Heure Normale ST: Standard Time
# HA: Heure Avanc<e'>e DT: Daylight saving Time
#
# A: de l'Atlantique Atlantic
# C: du Centre Central
# E: de l'Est Eastern
# M: Mountain
# N: Newfoundland
# P: du Pacifique Pacific
# R: des Rocheuses
# T: de Terre-Neuve
# Y: du Yukon Yukon
#
# From Paul Eggert (1994-11-22):
# Alas, this sort of thing must be handled by localization software.

# Unless otherwise specified, the data for Canada are all from Shanks
# & Pottenger.

#
# From Chris Walton (2006-04-01, 2006-04-25, 2006-06-26, 2007-01-31,
# 2007-03-01):
# The British Columbia government announced yesterday that it will
# adjust daylight savings next year to align with changes in the
# U.S. and the rest of Canada...
# http://www2.news.gov.bc.ca/news\_releases\_2005-2009/2006AG0014-000330.htm
# ...
# Nova Scotia
# Daylight saving time will be extended by four weeks starting in 2007....
# http://www.gov.ns.ca/just/regulations/rg2/2006/ma1206.pdf

```


[For New Brunswick] the new legislation dictates that the time change is to
be done at 02:00 instead of 00:01.
<http://www.gnb.ca/0062/acts/BBA-2006/Chap-19.pdf>
...
Manitoba has traditionally changed the clock every fall at 03:00.
As of 2006, the transition is to take place one hour earlier at 02:00.
<http://web2.gov.mb.ca/laws/statutes/ccsm/o030e.php>
...
[Alberta, Ontario, Quebec] will follow US rules.
http://www.qp.gov.ab.ca/documents/spring/CH03_06.CFM
http://www.e-laws.gov.on.ca/DBLaws/Source/Regs/English/2006/R06111_e.htm

<http://www2.publicationsduquebec.gouv.qc.ca/dynamicSearch/telecharge.php?type=5&file=2006C39A.PDF>
...
P.E.I. will follow US rules....
http://www.assembly.pe.ca/bills/pdf_chapter/62/3/chapter-41.pdf
...
Province of Newfoundland and Labrador....
<http://www.hoa.gov.nl.ca/hoa/bills/Bill0634.htm>
...
Yukon
http://www.gov.yk.ca/legislation/regs/oic2006_127.pdf
...
N.W.T. will follow US rules. Whoever maintains the government web site
does not seem to believe in bookmarks. To see the news release, click the
following link and search for "Daylight Savings Time Change". Press the
"Daylight Savings Time Change" link; it will fire off a popup using
JavaScript.
<http://www.exec.gov.nt.ca/currentnews/currentPR.asp?mode=archive>
...
Nunavut
An amendment to the Interpretation Act was registered on February 19/2007....
<http://action.attavik.ca/home/justice-gn/attach/2007/gaz02part2.pdf>

From Paul Eggert (2006-04-25):

H. David Matthews and Mary Vincent's map
<http://www.canadiangeographic.ca/Magazine/SO98/geomap.asp>>
"It's about TIME", *Canadian Geographic* (September-October 1998)
 contains detailed boundaries for regions observing nonstandard
time and daylight saving time arrangements in Canada circa 1998.

INMS, the Institute for National Measurement Standards in Ottawa, has http://inms-ienm.nrc-cnrc.gc.ca/en/time_services/daylight_saving_e.php>
information about standard and daylight saving time zones in Canada.
 (updated periodically).
Its unofficial information is often taken from Matthews and Vincent.

From Paul Eggert (2006-06-27):
For now, assume all of DST-observing Canada will fall into line with the
new US DST rules,

From Chris Walton (2011-12-01)
In the first of Tammy Hardwick's articles

http://www.ilovecreston.com/?p=articles&t=spec&ar=260

she quotes
the Friday November 1/1918 edition of the Creston Review.
The quote includes these two statements:
'Sunday the CPR went back to the old system of time...'
'... The daylight saving scheme was dropped all over Canada at the same time,'
These statements refer to a transition from daylight time to standard time
that occurred nationally on Sunday October 27/1918. This transition was
also documented in the Saturday October 26/1918 edition of the Toronto Star.

In light of that evidence, we alter the date from the earlier believed
Oct 31, to Oct 27, 1918 (and Sunday is a more likely transition day
than Thursday) in all Canadian rulesets.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Canada 1918 only - Apr 14 2:00 1:00 D
Rule Canada 1918 only - Oct 27 2:00 0 S
Rule Canada 1942 only - Feb 9 2:00 1:00 W # War
Rule Canada 1945 only - Aug 14 23:00u 1:00 P # Peace
Rule Canada 1945 only - Sep 30 2:00 0 S
Rule Canada 1974 1986 - Apr lastSun 2:00 1:00 D
Rule Canada 1974 2006 - Oct lastSun 2:00 0 S
Rule Canada 1987 2006 - Apr Sun>=1 2:00 1:00 D
Rule Canada 2007 max - Mar Sun>=8 2:00 1:00 D
Rule Canada 2007 max - Nov Sun>=1 2:00 0 S

Newfoundland and Labrador

From Paul Eggert (2000-10-02):
Matthews and Vincent (1998) write that Labrador should use NST/NDT,
but the only part of Labrador that follows the rules is the
southeast corner, including Port Hope Simpson and Mary's Harbour,
but excluding, say, Black Tickle.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule StJohns 1917 only - Apr 8 2:00 1:00 D
Rule StJohns 1917 only - Sep 17 2:00 0 S

Whitman gives 1919 Apr 5 and 1920 Apr 5; go with Shanks & Pottenger.
Rule StJohns 1919 only - May 5 23:00 1:00 D
Rule StJohns 1919 only - Aug 12 23:00 0 S
For 1931-1935 Whitman gives Apr same date; go with Shanks & Pottenger.
Rule StJohns 1920 1935 - May Sun>=1 23:00 1:00 D
Rule StJohns 1920 1935 - Oct lastSun 23:00 0 S
For 1936-1941 Whitman gives May Sun>=8 and Oct Sun>=1; go with Shanks &

Pottenger.
Rule StJohns 1936 1941 - May Mon>=9 0:00 1:00 D
Rule StJohns 1936 1941 - Oct Mon>=2 0:00 0 S
Whitman gives the following transitions:
1942 03-01/12-31, 1943 05-30/09-05, 1944 07-10/09-02, 1945 01-01/10-07
but go with Shanks & Pottenger and assume they used Canadian rules.
For 1946-9 Whitman gives May 5,4,9,1 - Oct 1,5,3,2, and for 1950 he gives
Apr 30 - Sep 24; go with Shanks & Pottenger.
Rule StJohns 1946 1950 - May Sun>=8 2:00 1:00 D
Rule StJohns 1946 1950 - Oct Sun>=2 2:00 0 S
Rule StJohns 1951 1986 - Apr lastSun 2:00 1:00 D
Rule StJohns 1951 1959 - Sep lastSun 2:00 0 S
Rule StJohns 1960 1986 - Oct lastSun 2:00 0 S
From Paul Eggert (2000-10-02):
INMS (2000-09-12) says that, since 1988 at least, Newfoundland switches
at 00:01 local time. For now, assume it started in 1987.

From Michael Pelley (2011-09-12):
We received today, Monday, September 12, 2011, notification that the
changes to the Newfoundland Standard Time Act have been proclaimed.
The
change in the Act stipulates that the change from Daylight Savings
Time to Standard Time and from Standard Time to Daylight Savings Time
now occurs at 2:00AM.
...

http://www.assembly.nl.ca/legislation/sr/annualstatutes/2011/1106.chp.htm

...
MICHAEL PELLEY | Manager of Enterprise Architecture - Solution Delivery
Office of the Chief Information Officer
Executive Council
Government of Newfoundland & Labrador

Rule StJohns 1987 only - Apr Sun>=1 0:01 1:00 D
Rule StJohns 1987 2006 - Oct lastSun 0:01 0 S
Rule StJohns 1988 only - Apr Sun>=1 0:01 2:00 DD
Rule StJohns 1989 2006 - Apr Sun>=1 0:01 1:00 D
Rule StJohns 2007 2011 - Mar Sun>=8 0:01 1:00 D
Rule StJohns 2007 2010 - Nov Sun>=1 0:01 0 S

```

#
# St John's has an apostrophe, but Posix file names can't have apostrophes.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/St_Johns -3:30:52 - LMT 1884
-3:30:52 StJohns N%sT 1918
-3:30:52
Canada N%sT 1919
-3:30:52 StJohns N%sT 1935 Mar 30
-3:30 StJohns N%sT 1942 May 11
-3:30 Canada N%sT 1946
-3:30 StJohns N%sT 2011 Nov
-3:30 Canada N%sT

# most of east Labrador

# The name `Happy Valley-Goose Bay' is too long; use `Goose Bay'.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Goose_Bay -4:01:40 - LMT 1884 # Happy Valley-Goose Bay
-3:30:52 - NST 1918
-3:30:52 Canada N%sT 1919
-3:30:52 - NST 1935 Mar 30
-3:30 - NST 1936
-3:30 StJohns N%sT 1942 May 11
-3:30 Canada N%sT 1946
-3:30 StJohns N%sT 1966 Mar 15 2:00
-4:00 StJohns A%sT 2011 Nov
-4:00 Canada A%sT

# west Labrador, Nova Scotia, Prince Edward I

# From Paul Eggert (2006-03-22):
# Shanks & Pottenger write that since 1970 most of this region has been like
# Halifax. Many locales did not observe peacetime DST until 1972;
# Glace Bay, NS is the largest that we know of.
# Shanks & Pottenger also write that Liverpool, NS was the only town
# in Canada to observe DST
# in 1971 but not 1970; for now we'll assume
# this is a typo.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Halifax 1916 only - Apr 1 0:00 1:00 D
Rule Halifax 1916 only - Oct 1 0:00 0 S
Rule Halifax 1920 only - May 9 0:00 1:00 D
Rule Halifax 1920 only - Aug 29 0:00 0 S
Rule Halifax 1921 only - May 6 0:00 1:00 D
Rule Halifax 1921 1922 - Sep 5 0:00 0 S
Rule Halifax 1922 only - Apr 30 0:00 1:00 D

```

Rule Halifax 1923 1925 - May Sun>=1 0:00 1:00 D
 Rule Halifax 1923 only - Sep 4 0:00 0 S
 Rule Halifax 1924 only - Sep 15 0:00 0 S
 Rule Halifax 1925 only - Sep 28 0:00 0 S
 Rule Halifax 1926 only - May 16 0:00 1:00 D
 Rule Halifax 1926 only - Sep 13 0:00 0 S
 Rule Halifax 1927 only - May 1 0:00 1:00 D
 Rule Halifax 1927 only - Sep 26 0:00 0 S
 Rule Halifax 1928 1931 - May Sun>=8 0:00 1:00 D
 Rule Halifax 1928 only - Sep 9 0:00 0 S
 Rule Halifax 1929 only - Sep 3 0:00 0 S
 Rule Halifax 1930 only - Sep 15 0:00 0 S
 Rule Halifax 1931 1932 - Sep Mon>=24 0:00 0 S
 Rule Halifax 1932 only - May 1 0:00 1:00 D
 Rule Halifax 1933 only - Apr 30 0:00 1:00 D
 Rule Halifax 1933 only - Oct
 2 0:00 0 S
 Rule Halifax 1934 only - May 20 0:00 1:00 D
 Rule Halifax 1934 only - Sep 16 0:00 0 S
 Rule Halifax 1935 only - Jun 2 0:00 1:00 D
 Rule Halifax 1935 only - Sep 30 0:00 0 S
 Rule Halifax 1936 only - Jun 1 0:00 1:00 D
 Rule Halifax 1936 only - Sep 14 0:00 0 S
 Rule Halifax 1937 1938 - May Sun>=1 0:00 1:00 D
 Rule Halifax 1937 1941 - Sep Mon>=24 0:00 0 S
 Rule Halifax 1939 only - May 28 0:00 1:00 D
 Rule Halifax 1940 1941 - May Sun>=1 0:00 1:00 D
 Rule Halifax 1946 1949 - Apr lastSun 2:00 1:00 D
 Rule Halifax 1946 1949 - Sep lastSun 2:00 0 S
 Rule Halifax 1951 1954 - Apr lastSun 2:00 1:00 D
 Rule Halifax 1951 1954 - Sep lastSun 2:00 0 S
 Rule Halifax 1956 1959 - Apr lastSun 2:00 1:00 D
 Rule Halifax 1956 1959 - Sep lastSun 2:00 0 S
 Rule Halifax 1962 1973 - Apr lastSun 2:00 1:00 D
 Rule Halifax 1962 1973 - Oct lastSun 2:00 0 S
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone America/Halifax -4:14:24 - LMT 1902
 Jun 15
 -4:00 Halifax A%sT 1918
 -4:00 Canada A%sT 1919
 -4:00 Halifax A%sT 1942 Feb 9 2:00s
 -4:00 Canada A%sT 1946
 -4:00 Halifax A%sT 1974
 -4:00 Canada A%sT
 Zone America/Glace_Bay -3:59:48 - LMT 1902 Jun 15
 -4:00 Canada A%sT 1953
 -4:00 Halifax A%sT 1954
 -4:00 - AST 1972

-4:00 Halifax A%sT 1974

-4:00 Canada A%sT

New Brunswick

From Paul Eggert (2007-01-31):

The Time Definition Act <<http://www.gnb.ca/0062/PDF-acts/t-06.pdf>>

says they changed at 00:01 through 2006, and

<<http://www.canlii.org/nb/laws/sta/t-6/20030127/whole.html>> makes it

clear that this was the case since at least 1993.

For now, assume it started in 1993.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Moncton 1933 1935 - Jun Sun>=8 1:00 1:00 D

Rule Moncton 1933 1935 - Sep Sun>=8 1:00 0 S

Rule Moncton 1936 1938 - Jun Sun>=1 1:00 1:00 D

Rule Moncton 1936 1938 - Sep Sun>=1 1:00 0 S

Rule Moncton 1939 only - May 27 1:00 1:00 D

Rule Moncton 1939 1941 - Sep Sat>=21 1:00 0 S

Rule Moncton 1940 only - May 19 1:00 1:00 D

Rule Moncton 1941 only - May

4 1:00 1:00 D

Rule Moncton 1946 1972 - Apr lastSun 2:00 1:00 D

Rule Moncton 1946 1956 - Sep lastSun 2:00 0 S

Rule Moncton 1957 1972 - Oct lastSun 2:00 0 S

Rule Moncton 1993 2006 - Apr Sun>=1 0:01 1:00 D

Rule Moncton 1993 2006 - Oct lastSun 0:01 0 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Moncton -4:19:08 - LMT 1883 Dec 9

-5:00 - EST 1902 Jun 15

-4:00 Canada A%sT 1933

-4:00 Moncton A%sT 1942

-4:00 Canada A%sT 1946

-4:00 Moncton A%sT 1973

-4:00 Canada A%sT 1993

-4:00 Moncton A%sT 2007

-4:00 Canada A%sT

Quebec

From Paul Eggert (2006-07-09):

Shanks & Pottenger write that since 1970 most of Quebec has been

like Montreal.

From Paul Eggert (2006-06-27):

Matthews and Vincent (1998) also write that Quebec east of the -63

meridian is supposed to observe AST, but residents as far east as

Natashquan use EST/EDT, and residents east of Natashquan use AST.

In "Official
time in Quebec" the Quebec department of justice writes in
<http://www.justice.gouv.qc.ca/english/publications/generale/temps-regl-1-a.htm>
that "The residents of the Municipality of the
Cote-Nord-du-Golfe-Saint-Laurent and the municipalities of Saint-Augustin,
Bonne-Esperance and Blanc-Sablon apply the Official Time Act as it is
written and use Atlantic standard time all year round. The same applies to
the residents of the Native facilities along the lower North Shore."
<<http://www.assnat.qc.ca/eng/37legislature2/Projets-loi/Publics/06-a002.htm>>
says this common practice was codified into law as of 2007.
For lack of better info, guess this practice began around 1970, contra to
Shanks & Pottenger who have this region observing AST/ADT.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Mont 1917 only - Mar 25 2:00 1:00 D

Rule Mont 1917 only - Apr 24 0:00 0 S

Rule Mont 1919 only - Mar 31 2:30 1:00 D

Rule Mont 1919 only - Oct 25 2:30 0 S

Rule Mont 1920 only - May 2 2:30 1:00 D

Rule Mont 1920 1922 - Oct Sun>=1 2:30 0 S

Rule Mont 1921 only - May

1 2:00 1:00 D

Rule Mont 1922 only - Apr 30 2:00 1:00 D

Rule Mont 1924 only - May 17 2:00 1:00 D

Rule Mont 1924 1926 - Sep lastSun 2:30 0 S

Rule Mont 1925 1926 - May Sun>=1 2:00 1:00 D

The 1927-to-1937 rules can be expressed more simply as

Rule Mont 1927 1937 - Apr lastSat 24:00 1:00 D

Rule Mont 1927 1937 - Sep lastSat 24:00 0 S

The rules below avoid use of 24:00

(which pre-1998 versions of zic cannot handle).

Rule Mont 1927 only - May 1 0:00 1:00 D

Rule Mont 1927 1932 - Sep lastSun 0:00 0 S

Rule Mont 1928 1931 - Apr lastSun 0:00 1:00 D

Rule Mont 1932 only - May 1 0:00 1:00 D

Rule Mont 1933 1940 - Apr lastSun 0:00 1:00 D

Rule Mont 1933 only - Oct 1 0:00 0 S

Rule Mont 1934 1939 - Sep lastSun 0:00 0 S

Rule Mont 1946 1973 - Apr lastSun 2:00 1:00 D

Rule Mont 1945 1948 - Sep lastSun 2:00 0 S

Rule Mont 1949 1950 - Oct lastSun 2:00 0 S

Rule Mont 1951 1956 - Sep lastSun 2:00 0 S

Rule Mont 1957 1973 - Oct lastSun 2:00 0 S

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Blanc-Sablon -3:48:28 - LMT 1884

-4:00 Canada A%sT 1970

-4:00 - AST
Zone America/Montreal -4:54:16 - LMT 1884
-5:00 Mont E%ST 1918
-5:00 Canada E%ST 1919
-5:00 Mont E%ST 1942 Feb 9 2:00s
-5:00 Canada E%ST 1946
-5:00 Mont E%ST 1974
-5:00 Canada E%ST

Ontario

From Paul Eggert (2006-07-09):
Shanks & Pottenger write that since 1970 most of Ontario has been like
Toronto.
Thunder Bay skipped DST in 1973.
Many smaller locales did not observe peacetime DST until 1974;
Nipigon (EST) and Rainy River (CST) are the largest that we know of.
Far west Ontario is like Winnipeg; far east Quebec is like Halifax.

From Mark Brader (2003-07-26):
[According to the Toronto Star] Orillia, Ontario, adopted DST
effective Saturday, 1912-06-22, 22:00; the article mentions that
Port Arthur (now part of Thunder Bay, Ontario) as well as Moose Jaw
have already done so. In Orillia DST was to run
until Saturday,
1912-08-31 (no time mentioned), but it was met with considerable
hostility from certain segments of the public, and was revoked after
only two weeks -- I copied it as Saturday, 1912-07-07, 22:00, but
presumably that should be -07-06. (1912-06-19, -07-12; also letters
earlier in June).

Kenora, Ontario, was to abandon DST on 1914-06-01 (-05-21).

From Paul Eggert (1997-10-17):
Mark Brader writes that an article in the 1997-10-14 Toronto Star
says that Atikokan, Ontario currently does not observe DST,
but will vote on 11-10 whether to use EST/EDT.
He also writes that the
<http://www.gov.on.ca/MBS/english/publications/statregs/ccontext.html>
Ontario Time Act (1990, Chapter T.9)

says that Ontario east of 90W uses EST/EDT, and west of 90W uses CST/CDT.
Officially Atikokan is therefore on CST/CDT, and most likely this report
concerns a non-official time observed as a matter of local practice.

From Paul Eggert (2000-10-02):
#

Matthews and Vincent (1998) write that Atikokan, Pickle Lake, and New Osnaburgh observe CST all year, that Big Trout Lake observes CST/CDT, and that Upsala and Shebandowan observe EST/EDT, all in violation of the official Ontario rules.

#

From Paul Eggert (2006-07-09):

Chris Walton (2006-07-06) mentioned an article by Stephanie MacLellan in the 2005-07-21 Chronicle-Journal, which said:

#

The clocks in Atikokan stay set on standard time year-round.

This means they spend about half the time on central time and the other half on eastern time.

#

For the most part, the system works, Mayor Dennis Brown said.

#

"The majority of businesses in Atikokan deal more with Eastern Canada, but there are some that deal with Western Canada," he said. "I don't see any changes happening here."

#

Walton also writes "Supposedly Pickle Lake and Mishkeegogamang [New Osnaburgh] follow the same practice."

From Garry McKinnon (2006-07-14) via Chris Walton:

I chatted with

a member of my board who has an outstanding memory

and a long history in Atikokan (and in the telecom industry) and he

can say for certain that Atikokan has been practicing the current

time keeping since 1952, at least.

From Paul Eggert (2006-07-17):

Shanks & Pottenger say that Atikokan has agreed with Rainy River

ever since standard time was introduced, but the information from

McKinnon sounds more authoritative. For now, assume that Atikokan

switched to EST immediately after WWII era daylight saving time

ended. This matches the old (less-populous) America/Coral_Harbour

entry since our cutoff date of 1970, so we can move

America/Coral_Harbour to the 'backward' file.

From Mark Brader (2010-03-06):

#

Currently the database has:

#

Ontario

#

From Paul Eggert (2006-07-09):

Shanks & Pottenger write that since 1970 most of Ontario has been like

Toronto.

Thunder Bay skipped DST in 1973.

Many smaller locales did not observe peacetime DST until
1974;
Nipigon (EST) and Rainy River (CST) are the largest that we know of.

In the (Toronto) Globe and Mail for Saturday, 1955-09-24, in the bottom
right corner of page 1, it says that Toronto will return to standard
time at 2 am Sunday morning (which agrees with the database), and that:

The one-hour setback will go into effect throughout most of Ontario,
except in areas like Windsor which remains on standard time all year.

Windsor is, of course, a lot larger than Nipigon.

I only came across this incidentally. I don't know if Windsor began
observing DST when Detroit did, or in 1974, or on some other date.

By the way, the article continues by noting that:

Some cities in the United States have pushed the deadline back
three weeks and will change over from daylight saving in October.

From Arthur David Olson (2010-07-17):

"Standard Time and Time Zones in Canada" appeared in
The Journal of The Royal Astronomical Society of
Canada,
volume 26, number 2 (February 1932) and, as of 2010-07-17,
was available at

http://adsabs.harvard.edu/full/1932JRASC..26...49S

It includes the text below (starting on page 57):

A list of the places in Canada using daylight saving time would
require yearly revision. From information kindly furnished by
the provincial governments and by the postmasters in many cities
and towns, it is found that the following places used daylight sav-
ing in 1930. The information for the province of Quebec is definite,
for the other provinces only approximate:

Province Daylight saving time used
Prince Edward Island Not used.
Nova Scotia In Halifax only.
New Brunswick In St. John only.
Quebec In the following places:
Montreal Lachine
Quebec Mont-Royal

Levis Iberville
 # St. Lambert Cap de la Madeleine
 # Verdun Loretteville
 # Westmount Richmond
 # Outremont St.
 Jerome
 # Longueuil Greenfield Park
 # Arvida Waterloo
 # Chambly-Canton Beaulieu
 # Melbourne La Tuque
 # St. Theophile Buckingham
 # Ontario Used generally in the cities and towns along
 # the southerly part of the province. Not
 # used in the northwesterlhy part.
 # Manitoba Not used.
 # Saskatchewan In Regina only.
 # Alberta Not used.
 # British Columbia Not used.
 #
 # With some exceptions, the use of daylight saving may be said to be limited
 # to those cities and towns lying between Quebec city and Windsor, Ont.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Toronto 1919 only - Mar 30 23:30 1:00 D

Rule Toronto 1919 only - Oct 26 0:00 0 S

Rule Toronto 1920 only - May 2 2:00 1:00 D

Rule Toronto 1920 only - Sep 26 0:00 0 S

Rule Toronto 1921 only - May 15 2:00 1:00 D

Rule Toronto 1921 only - Sep 15 2:00 0 S

Rule Toronto 1922 1923 - May Sun>=8 2:00 1:00 D

Shanks & Pottenger say 1923-09-19; assume it's a typo and that "-16"
 # was meant.

Rule Toronto 1922 1926 - Sep Sun>=15 2:00 0 S

Rule Toronto 1924 1927 - May Sun>=1 2:00 1:00 D

#

The 1927-to-1939 rules can be expressed more simply as

Rule Toronto 1927 1937 - Sep Sun>=25 2:00 0 S

Rule Toronto 1928 1937 - Apr Sun>=25 2:00 1:00 D

Rule Toronto 1938 1940 - Apr lastSun 2:00 1:00 D

Rule Toronto 1938 1939 - Sep lastSun 2:00 0 S

The rules below avoid use of Sun>=25

(which pre-2004 versions of zic cannot handle).

Rule Toronto 1927 1932 - Sep lastSun 2:00 0 S

Rule Toronto 1928 1931 - Apr lastSun 2:00 1:00 D

Rule Toronto 1932 only - May 1 2:00 1:00 D

Rule Toronto 1933 1940 - Apr lastSun 2:00 1:00 D

Rule Toronto 1933 only - Oct 1 2:00 0 S

Rule Toronto 1934 1939 - Sep lastSun 2:00 0 S

Rule Toronto 1945 1946 - Sep lastSun 2:00 0 S
 Rule Toronto 1946 only - Apr lastSun 2:00 1:00 D
 Rule Toronto 1947 1949 - Apr lastSun 0:00 1:00 D
 Rule Toronto 1947 1948 - Sep lastSun 0:00 0 S
 Rule Toronto 1949 only - Nov lastSun 0:00 0 S
 Rule Toronto 1950 1973 - Apr lastSun 2:00 1:00 D
 Rule Toronto 1950 only - Nov lastSun 2:00 0 S
 Rule Toronto 1951 1956 - Sep lastSun 2:00 0 S
 #
 Shanks & Pottenger say Toronto ended DST a week early in 1971,
 # namely on 1971-10-24, but Mark Brader wrote (2003-05-31) that this
 # is wrong, and that he had confirmed it by checking the 1971-10-30
 # Toronto Star, which said that DST was ending 1971-10-31 as usual.
 Rule Toronto 1957 1973 - Oct lastSun 2:00 0 S

 # From Paul Eggert (2003-07-27):
 # Willett (1914-03) writes (p. 17) "In the Cities of Fort William, and
 # Port Arthur, Ontario, the principle of the Bill has been in
 # operation for the past three years, and in the City of Moose Jaw,
 # Saskatchewan, for one year."

 # From David Bryan via Tory Tronrud, Director/Curator,
 # Thunder Bay Museum (2003-11-12):
 # There is some suggestion, however, that, by-law or not, daylight
 # savings time was being practiced in Fort William and Port Arthur
 # before 1909.... [I]n 1910, the line between the Eastern and Central
 # Time Zones was permanently moved about two hundred miles
 west to
 # include the Thunder Bay area.... When Canada adopted daylight
 # savings time in 1916, Fort William and Port Arthur, having done so
 # already, did not change their clocks.... During the Second World
 # War,... [t]he cities agreed to implement DST during the summer
 # months for the remainder of the war years.

 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone America/Toronto -5:17:32 - LMT 1895
 -5:00 Canada E%sT 1919
 -5:00 Toronto E%sT 1942 Feb 9 2:00s
 -5:00 Canada E%sT 1946
 -5:00 Toronto E%sT 1974
 -5:00 Canada E%sT
 Zone America/Thunder_Bay -5:57:00 - LMT 1895
 -6:00 - CST 1910
 -5:00 - EST 1942
 -5:00 Canada E%sT 1970
 -5:00 Mont E%sT 1973
 -5:00 - EST 1974
 -5:00 Canada E%sT

Zone America/Nipigon -5:53:04 - LMT 1895

-5:00 Canada E%sT 1940 Sep 29

-5:00 1:00 EDT 1942 Feb 9 2:00s

-5:00 Canada E%sT

Zone America/Rainy_River -6:18:16 - LMT 1895

-6:00 Canada C%sT 1940 Sep 29

-6:00 1:00 CDT 1942 Feb 9 2:00s

-6:00 Canada C%sT

Zone America/Atikokan -6:06:28

- LMT 1895

-6:00 Canada C%sT 1940 Sep 29

-6:00 1:00 CDT 1942 Feb 9 2:00s

-6:00 Canada C%sT 1945 Sep 30 2:00

-5:00 - EST

Manitoba

From Rob Douglas (2006-04-06):

the old Manitoba Time Act - as amended by Bill 2, assented to

March 27, 1987 ... said ...

"between two o'clock Central Standard Time in the morning of

the first Sunday of April of each year and two o'clock Central

Standard Time in the morning of the last Sunday of October next

following, one hour in advance of Central Standard Time."...

I believe that the English legislation [of the old time act] had =

been assented to (March 22, 1967)....

Also, as far as I can tell, there was no order-in-council varying

the time of Daylight Saving Time for 2005 and so the provisions of

the 1987 version would apply - the changeover was at 2:00 Central

Standard Time (i.e. not until 3:00 Central Daylight Time).

From Paul Eggert (2006-04-10):

Shanks & Pottenger say Manitoba switched

at 02:00 (not 02:00s)

starting 1966. Since 02:00s is clearly correct for 1967 on, assume

it was also 02:00s in 1966.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Winn 1916 only - Apr 23 0:00 1:00 D

Rule Winn 1916 only - Sep 17 0:00 0 S

Rule Winn 1918 only - Apr 14 2:00 1:00 D

Rule Winn 1918 only - Oct 27 2:00 0 S

Rule Winn 1937 only - May 16 2:00 1:00 D

Rule Winn 1937 only - Sep 26 2:00 0 S

Rule Winn 1942 only - Feb 9 2:00 1:00 W # War

Rule Winn 1945 only - Aug 14 23:00u 1:00 P # Peace

Rule Winn 1945 only - Sep lastSun 2:00 0 S

Rule Winn 1946 only - May 12 2:00 1:00 D
Rule Winn 1946 only - Oct 13 2:00 0 S
Rule Winn 1947 1949 - Apr lastSun 2:00 1:00 D
Rule Winn 1947 1949 - Sep lastSun 2:00 0 S
Rule Winn 1950 only - May 1 2:00 1:00 D
Rule Winn 1950 only - Sep 30 2:00 0 S
Rule Winn 1951 1960 - Apr lastSun 2:00 1:00 D
Rule Winn 1951 1958 - Sep lastSun 2:00 0 S
Rule Winn 1959 only - Oct lastSun 2:00 0 S
Rule Winn 1960 only - Sep lastSun 2:00 0 S
Rule Winn 1963 only - Apr lastSun 2:00 1:00 D
Rule Winn 1963 only - Sep 22 2:00 0 S
Rule Winn 1966 1986 - Apr lastSun 2:00s 1:00 D
Rule Winn 1966 2005 - Oct lastSun 2:00s 0 S
Rule Winn 1987 2005 - Apr Sun>=1 2:00s 1:00 D

Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone America/Winnipeg -6:28:36 - LMT 1887 Jul 16
-6:00 Winn C%sT 2006
-6:00 Canada C%sT

Saskatchewan

From Mark Brader (2003-07-26):

The first actual adoption of DST in Canada was at the municipal
level. As the [Toronto] Star put it (1912-06-07), "While people
elsewhere have long been talking of legislation to save daylight,
the city of Moose Jaw [Saskatchewan] has acted on its own hook."
DST in Moose Jaw began on Saturday, 1912-06-01 (no time mentioned:
presumably late evening, as below), and would run until "the end of
the summer". The discrepancy between municipal time and railroad
time was noted.

From Paul Eggert (2003-07-27):

Willett (1914-03) notes that DST "has been in operation ... in the
City of Moose Jaw, Saskatchewan,
for one year."

From Paul Eggert (2006-03-22):

Shanks & Pottenger say that since 1970 this region has mostly been as Regina.
Some western towns (e.g. Swift Current) switched from MST/MDT to CST in 1972.
Other western towns (e.g. Lloydminster) are like Edmonton.
Matthews and Vincent (1998) write that Denare Beach and Creighton
are like Winnipeg, in violation of Saskatchewan law.

From W. Jones (1992-11-06):

The . . . below is based on information I got from our law library, the

provincial archives, and the provincial Community Services department.
A precise history would require digging through newspaper archives, and
since you didn't say what you wanted, I didn't bother.

Saskatchewan is split by a time zone meridian (105W) and over the years
the boundary became pretty ragged as communities near it reevaluated
their affiliations in one direction or the other. In 1965 a provincial
referendum favoured legislating common time practices.

On 15 April
1966 the Time Act (c. T-14, Revised Statutes of
Saskatchewan 1978) was proclaimed, and established that the eastern
part of Saskatchewan would use CST year round, that districts in
northwest Saskatchewan would by default follow CST but could opt to
follow Mountain Time rules (thus 1 hour difference in the winter and
zero in the summer), and that districts in southwest Saskatchewan would
by default follow MT but could opt to follow CST.

It took a few years for the dust to settle (I know one story of a town
on one time zone having its school in another, such that a mom had to
serve her family lunch in two shifts), but presently it seems that only
a few towns on the border with Alberta (e.g. Lloydminster) follow MT
rules any more; all other districts appear to have used CST year round
since sometime in the 1960s.

From Chris Walton (2006-06-26):
The Saskatchewan time act which was last updated in 1996 is about 30 pages
long and rather painful to read.

<http://www.qp.gov.sk.ca/documents/English/Statutes/Statutes/T14.pdf>

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Regina 1918 only - Apr 14 2:00 1:00 D
Rule Regina 1918 only - Oct 27 2:00 0 S
Rule Regina 1930 1934 - May Sun>=1 0:00 1:00 D
Rule Regina 1930 1934 - Oct Sun>=1 0:00 0 S
Rule Regina 1937 1941 - Apr Sun>=8 0:00 1:00 D
Rule Regina 1937 only - Oct Sun>=8 0:00 0 S
Rule Regina 1938 only - Oct Sun>=1 0:00 0 S
Rule Regina 1939 1941 - Oct Sun>=8 0:00 0 S
Rule Regina 1942 only - Feb 9 2:00 1:00 W # War
Rule Regina 1945 only - Aug 14 23:00u 1:00 P # Peace
Rule Regina 1945 only - Sep lastSun 2:00 0 S
Rule Regina 1946 only - Apr Sun>=8 2:00 1:00 D
Rule Regina 1946 only - Oct Sun>=8 2:00 0 S
Rule Regina 1947 1957 - Apr lastSun 2:00 1:00 D
Rule Regina 1947 1957 - Sep lastSun 2:00 0 S
Rule Regina 1959 only - Apr lastSun 2:00 1:00 D

```

Rule Regina 1959 only - Oct lastSun 2:00 0 S
#
Rule Swift 1957 only - Apr lastSun 2:00 1:00 D
Rule Swift 1957 only - Oct lastSun 2:00 0 S
Rule Swift 1959 1961 - Apr lastSun 2:00 1:00 D
Rule Swift 1959 only - Oct lastSun 2:00 0 S
Rule Swift 1960 1961 - Sep lastSun 2:00 0 S
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Regina -6:58:36 - LMT 1905 Sep
-7:00 Regina M%sT 1960 Apr lastSun 2:00
-6:00 - CST
Zone America/Swift_Current -7:11:20 - LMT 1905 Sep
-7:00 Canada M%sT 1946 Apr lastSun 2:00
-7:00 Regina M%sT 1950
-7:00 Swift M%sT 1972 Apr lastSun 2:00
-6:00 - CST

# Alberta

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Edm 1918 1919 - Apr Sun>=8 2:00 1:00 D
Rule Edm 1918 only - Oct 27 2:00 0 S
Rule Edm 1919 only - May 27 2:00 0 S
Rule Edm 1920 1923 - Apr lastSun 2:00 1:00 D
Rule Edm 1920 only - Oct lastSun 2:00 0 S
Rule Edm 1921 1923 - Sep lastSun 2:00 0 S
Rule Edm 1942 only - Feb 9 2:00 1:00 W # War
Rule Edm 1945 only - Aug 14 23:00u 1:00 P # Peace
Rule Edm 1945 only - Sep lastSun 2:00 0 S
Rule Edm 1947 only - Apr lastSun 2:00 1:00 D
Rule Edm 1947 only - Sep lastSun 2:00 0 S
Rule Edm 1967 only - Apr lastSun 2:00 1:00 D
Rule Edm 1967 only - Oct lastSun 2:00 0 S
Rule Edm 1969 only - Apr lastSun 2:00 1:00 D
Rule Edm 1969 only - Oct lastSun 2:00 0 S
Rule Edm 1972 1986 - Apr lastSun 2:00 1:00 D
Rule Edm 1972 2006 - Oct lastSun 2:00 0 S
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Edmonton -7:33:52 - LMT 1906 Sep
-7:00 Edm M%sT 1987
-7:00 Canada M%sT

# British Columbia

```

From Paul Eggert (2006-03-22):
Shanks & Pottenger write that since 1970 most of this region has
been like Vancouver.
Dawson Creek uses MST. Much of east BC is like Edmonton.
Matthews and Vincent (1998) write that Creston is like Dawson Creek.

It seems though that (re: Creston) is not entirely correct:

From Chris Walton (2011-12-01):
There are two areas within the Canadian province of British Columbia
that do not currently observe daylight saving:
a) The Creston Valley (includes the town of Creston and surrounding area)
b) The eastern half of the Peace River Regional District
(includes
the cities of Dawson Creek and Fort St. John)

Earlier this year I stumbled across a detailed article about the time
keeping history of Creston; it was written by Tammy Hardwick who is the
manager of the Creston & District Museum. The article was written in May 2009.

http://www.ilovecreston.com/?p=articles&t=spec&ar=260

According to the article, Creston has not changed its clocks since June 1918.
i.e. Creston has been stuck on UTC-7 for 93 years.
Dawson Creek, on the other hand, changed its clocks as recently as April 1972.

Unfortunately the exact date for the time change in June 1918 remains
unknown and will be difficult to ascertain. I e-mailed Tammy a few months
ago to ask if Sunday June 2 was a reasonable guess. She said it was just
as plausible as any other date (in June). She also said that after writing the
article she had discovered another time change in 1916; this is
the subject
of another article which she wrote in October 2010.

http://www.creston.museum.bc.ca/index.php?module=comments&uop=view_comment&cm+id=56

Here is a summary of the three clock change events in Creston's history:
1. 1884 or 1885: adoption of Mountain Standard Time (GMT-7)
Exact date unknown
2. Oct 1916: switch to Pacific Standard Time (GMT-8)
Exact date in October unknown; Sunday October 1 is a reasonable guess.
3. June 1918: switch to Pacific Daylight Time (GMT-7)
Exact date in June unknown; Sunday June 2 is a reasonable guess.
note#1:
On Oct 27/1918 when daylight saving ended in the rest of Canada,
Creston did not change its clocks.
note#2:

During WWII when the Federal Government legislated a mandatory clock change,
Creston did not oblige.
note#3:
There is no guarantee that Creston will remain on Mountain Standard Time
(UTC-7) forever.

The subject was debated at least once this year by the town Council.

http://www.bclocalnews.com/kootenay_rockies/crestonvalleyadvance/news/116760809.html

During a period WWII, summer time (Daylight saving) was mandatory in Canada.
In Creston, that was handled by shifting the area to PST (-8:00) then applying
summer time to cause the offset to be -7:00, the same as it had been before
the change. It can be argued that the timezone abbreviation during this
period should be PDT rather than MST, but that doesn't seem important enough
(to anyone) to further complicate the rules.

The transition dates (and times) are guesses.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Vanc 1918 only - Apr 14 2:00 1:00 D

Rule Vanc 1918 only - Oct 27 2:00 0 S

Rule Vanc 1942 only - Feb 9 2:00 1:00 W # War

Rule Vanc 1945 only - Aug 14 23:00u 1:00 P # Peace

Rule Vanc 1945 only - Sep 30 2:00 0 S

Rule Vanc 1946 1986 - Apr lastSun 2:00 1:00 D

Rule Vanc 1946 only - Oct 13 2:00 0 S

Rule Vanc 1947 1961 - Sep lastSun 2:00 0 S

Rule Vanc 1962 2006 - Oct lastSun 2:00 0 S

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Vancouver -8:12:28 - LMT 1884

-8:00 Vanc P%sT 1987

-8:00 Canada P%sT

Zone America/Dawson_Creek -8:00:56 - LMT 1884

-8:00 Canada P%sT 1947

-8:00 Vanc P%sT 1972 Aug 30 2:00

-7:00 - MST

Zone America/Creston -7:46:04 - LMT 1884

-7:00 - MST 1916 Oct 1

-8:00 - PST 1918 Jun 2

-7:00 - MST

Northwest Territories, Nunavut, Yukon

From Paul Eggert (2006-03-22):

Dawson switched to PST in 1973. Inuvik switched to MST in 1979.

Mathew Englander (1996-10-07) gives the following refs:
* 1967. Paragraph 28(34)(g) of the Interpretation Act, S.C. 1967-68,
c. 7 defines Yukon standard time as UTC-9. This is still valid;
see Interpretation Act, R.S.C. 1985, c. I-21, s. 35(1).
* C.O. 1973/214 switched Yukon to PST on 1973-10-28 00:00.
*
O.I.C. 1980/02 established DST.
* O.I.C. 1987/056 changed DST to Apr firstSun 2:00 to Oct lastSun 2:00.
Shanks & Pottenger say Yukon's 1973-10-28 switch was at 2:00; go
with Englander.
From Chris Walton (2006-06-26):
Here is a link to the old daylight saving portion of the interpretation
act which was last updated in 1987:
http://www.gov.yk.ca/legislation/regs/oic1987_056.pdf

From Rives McDow (1999-09-04):
Nunavut ... moved ... to incorporate the whole territory into one time zone.
http://www.nunatsiaq.com/nunavut/nvt90903_13.html>
Nunavut moves to single time zone Oct. 31

From Antoine Leca (1999-09-06):
We then need to create a new timezone for the Kitikmeot region of Nunavut
to differentiate it from the Yellowknife region.

From Paul Eggert (1999-09-20):
http://www.nunavut.com/basicfacts/english/basicfacts_1territory.html>
Basic Facts: The New Territory
 (1999) reports that Pangnirtung operates on eastern time,

and that Coral Harbour does not observe DST. We don't know when
Pangnirtung switched to eastern time; we'll guess 1995.

From Rives McDow (1999-11-08):
On October 31, when the rest of Nunavut went to Central time,
Pangnirtung wobbled. Here is the result of their wobble:

The following businesses and organizations in Pangnirtung use Central Time:

First Air, Power Corp, Nunavut Construction, Health Center, RCMP,
Eastern Arctic National Parks, A & D Specialist

The following businesses and organizations in Pangnirtung use Eastern Time:

Hamlet office, All other businesses, Both schools, Airport operator

This has made for an interesting situation there, which warranted the news.
No one there that I spoke with seems concerned, or has plans to

change the local methods of keeping time, as it evidently does not
really interfere with any activities or make things difficult locally.
They plan to celebrate New Year's turn-over twice, one hour apart,
so
it appears that the situation will last at least that long.
The Nunavut Intergovernmental Affairs hopes that they will "come to
their senses", but the locals evidently don't see any problem with
the current state of affairs.

From Michaela Rodrigue, writing in the
http://www.nunatsiaq.com/archives/nunavut991130/nvt91119_17.html>
Nunatsiaq News (1999-11-19):
Clyde River, Pangnirtung and Sanikiluaq now operate with two time zones,
central - or Nunavut time - for government offices, and eastern time
for municipal offices and schools.... Igloolik [was similar but then]
made the switch to central time on Saturday, Nov. 6.

From Paul Eggert (2000-10-02):
Matthews and Vincent (1998) say the following, but we lack histories
for these potential new Zones.

The Canadian Forces station at Alert uses Eastern Time while the
handful of residents at the Eureka weather station [in the Central
zone] skip daylight savings. Baffin Island, which is crossed
by the
Central, Eastern and Atlantic Time zones only uses Eastern Time.
Gjoa Haven, Taloyoak and Pelly Bay all use Mountain instead of
Central Time and Southampton Island [in the Central zone] is not
required to use daylight savings.

From
http://www.nunatsiaq.com/archives/nunavut001130/nvt21110_02.html>
Nunavut now has two time zones
 (2000-11-10):
The Nunavut government would allow its employees in Kugluktuk and
Cambridge Bay to operate on central time year-round, putting them
one hour behind the rest of Nunavut for six months during the winter.
At the end of October the two communities had rebelled against
Nunavut's unified time zone, refusing to shift to eastern time with
the rest of the territory for the winter. Cambridge Bay remained on
central time, while Kugluktuk, even farther west, reverted to
mountain time, which they had used before the advent of Nunavut's
unified time zone in 1999.

From Rives McDow (2001-01-20), quoting
the Nunavut government:
The preceding decision came into effect at midnight, Saturday Nov 4, 2000.

From Paul Eggert (2000-12-04):

Let's just keep track of the official times for now.

From Rives McDow (2001-03-07):

The premier of Nunavut has issued a ministerial statement advising
that effective 2001-04-01, the territory of Nunavut will revert
back to three time zones (mountain, central, and eastern). Of the
cities in Nunavut, Coral Harbor is the only one that I know of that
has said it will not observe dst, staying on EST year round. I'm
checking for more info, and will get back to you if I come up with
more.

[Also see <http://www.nunatsiaq.com/nunavut/nvt10309_06.html> (2001-03-09).]

From Gwillim Law (2005-05-21):

According to maps at

http://inms-ienm.nrc-cnrc.gc.ca/images/time_services/TZ01SWE.jpg

http://inms-ienm.nrc-cnrc.gc.ca/images/time_services/TZ01SSE.jpg

(both dated 2003), and

<http://www.canadiangeographic.ca/Magazine/SO98/geomap.asp>

#

(from a 1998 Canadian Geographic article), the de facto and de jure time
for Southampton Island (at the north end of Hudson Bay) is UTC-5 all year
round. Using Google, it's easy to find other websites that confirm this.
I wasn't able to find how far back this time regimen goes, but since it
predates the creation of Nunavut, it probably goes back many years....
The Inuktitut name of Coral Harbour is Sallit, but it's rarely used.

#

From Paul Eggert (2005-07-26):

For lack of better information, assume that Southampton Island observed
daylight saving only during wartime.

From Chris Walton (2007-03-01):

... the community of Resolute (located on Cornwallis Island in
Nunavut) moved from Central Time to Eastern Time last November.
Basically the community did not change its clocks at the end of
daylight saving....

http://www.nnsf.com/frames/newspapers/2006-11/nov13_06none.html

From Chris Walton (2011-03-21):

Back in 2007 I initiated the creation of a new "zone
file" for Resolute

Bay. Resolute Bay is a small community located about 900km north of
the Arctic Circle. The zone file was required because Resolute Bay had
decided to use UTC-5 instead of UTC-6 for the winter of 2006-2007.

#

According to new information which I received last week, Resolute Bay
went back to using UTC-6 in the winter of 2007-2008...

#

On March 11/2007 most of Canada went onto daylight saving. On March
14/2007 I phoned the Resolute Bay hamlet office to do a "time check." I
talked to somebody that was both knowledgeable and helpful. I was able
to confirm that Resolute Bay was still operating on UTC-5. It was
explained to me that Resolute Bay had been on the Eastern Time zone
(EST) in the winter, and was now back on the Central Time zone (CDT).
i.e. the time zone had changed twice in the last year but the clocks
had not moved. The residents had to know which time zone they were in
so they could follow the correct TV schedule...

#

On Nov 02/2008

most of Canada went onto standard time. On Nov 03/2008 I
phoned the Resolute Bay hamlet office...[D]ue to the challenging nature
of the phone call, I decided to seek out an alternate source of
information. I found an e-mail address for somebody by the name of
Stephanie Adams whose job was listed as "Inns North Support Officer for
Arctic Co-operatives." I was under the impression that Stephanie lived
and worked in Resolute Bay...

#

On March 14/2011 I phoned the hamlet office again. I was told that
Resolute Bay had been using Central Standard Time over the winter of
2010-2011 and that the clocks had therefore been moved one hour ahead
on March 13/2011. The person I talked to was aware that Resolute Bay
had previously experimented with Eastern Standard Time but he could not
tell me when the practice had stopped.

#

On March 17/2011 I searched the Web to find an e-mail address of
somebody that might be able to tell me exactly when Resolute Bay went
off Eastern

Standard Time. I stumbled on the name "Aziz Kheraj." Aziz
used to be the mayor of Resolute Bay and he apparently owns half the
businesses including "South Camp Inn." This website has some info on
Aziz:

http://www.uphere.ca/node/493

#

I sent Aziz an e-mail asking when Resolute Bay had stopped using
Eastern Standard Time.

#

Aziz responded quickly with this: "hi, The time was not changed for the
1 year only, the following year, the community went back to the old way
of "spring ahead-fall behind" currently we are zulu plus 5 hrs and in
the winter Zulu plus 6 hrs"

#

This of course conflicted with everything I had ascertained in November 2008.

#

I sent Aziz a copy of my 2008 e-mail exchange with Stephanie. Aziz

responded with this: "Hi, Stephanie lives in Winnipeg. I live here, You
may want to check with the weather office in Resolute Bay or do a
search on the weather through Env. Canada. web site"

If I
had realized the Stephanie did not live in Resolute Bay I would
never have contacted her. I now believe that all the information I
obtained in November 2008 should be ignored...
I apologize for reporting incorrect information in 2008.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule NT_YK 1918 only - Apr 14 2:00 1:00 D

Rule NT_YK 1918 only - Oct 27 2:00 0 S

Rule NT_YK 1919 only - May 25 2:00 1:00 D

Rule NT_YK 1919 only - Nov 1 0:00 0 S

Rule NT_YK 1942 only - Feb 9 2:00 1:00 W # War

Rule NT_YK 1945 only - Aug 14 23:00u 1:00 P # Peace

Rule NT_YK 1945 only - Sep 30 2:00 0 S

Rule NT_YK 1965 only - Apr lastSun 0:00 2:00 DD

Rule NT_YK 1965 only - Oct lastSun 2:00 0 S

Rule NT_YK 1980 1986 - Apr lastSun 2:00 1:00 D

Rule NT_YK 1980 2006 - Oct lastSun 2:00 0 S

Rule NT_YK 1987 2006 - Apr Sun>=1 2:00 1:00 D

Zone NAME GMTOFF RULES FORMAT [UNTIL]

aka Panniqtuuq

Zone America/Pangnirtung 0 - zzz 1921 # trading post est.

-4:00 NT_YK A%sT 1995 Apr Sun>=1 2:00

-5:00 Canada E%sT 1999

Oct 31 2:00

-6:00 Canada C%sT 2000 Oct 29 2:00

-5:00 Canada E%sT

formerly Frobisher Bay

Zone America/Iqaluit 0 - zzz 1942 Aug # Frobisher Bay est.

-5:00 NT_YK E%sT 1999 Oct 31 2:00

-6:00 Canada C%sT 2000 Oct 29 2:00

-5:00 Canada E%sT

aka Qausuittuq

Zone America/Resolute 0 - zzz 1947 Aug 31 # Resolute founded

-6:00 NT_YK C%sT 2000 Oct 29 2:00

-5:00 - EST 2001 Apr 1 3:00

-6:00 Canada C%sT 2006 Oct 29 2:00

-5:00 - EST 2007 Mar 11 3:00

-6:00 Canada C%sT

aka Kangiqiniq

Zone America/Rankin_Inlet 0 - zzz 1957 # Rankin Inlet founded

-6:00 NT_YK C%sT 2000 Oct 29 2:00

-5:00 - EST 2001 Apr 1 3:00

-6:00 Canada C%sT

aka Iqaluktuuttiaq
Zone America/Cambridge_Bay 0 - zzz 1920 # trading post est.?
-7:00 NT_YK M%ST 1999 Oct 31 2:00
-6:00 Canada C%ST 2000 Oct 29 2:00
-5:00 - EST 2000 Nov 5 0:00
-6:00 - CST 2001 Apr 1 3:00
-7:00 Canada M%ST
Zone America/Yellowknife 0 - zzz 1935 # Yellowknife founded?
-7:00 NT_YK M%ST 1980
-7:00 Canada M%ST

Zone
America/Inuvik 0 - zzz 1953 # Inuvik founded
-8:00 NT_YK P%ST 1979 Apr lastSun 2:00
-7:00 NT_YK M%ST 1980
-7:00 Canada M%ST
Zone America/Whitehorse -9:00:12 - LMT 1900 Aug 20
-9:00 NT_YK Y%ST 1966 Jul 1 2:00
-8:00 NT_YK P%ST 1980
-8:00 Canada P%ST
Zone America/Dawson -9:17:40 - LMT 1900 Aug 20
-9:00 NT_YK Y%ST 1973 Oct 28 0:00
-8:00 NT_YK P%ST 1980
-8:00 Canada P%ST

#####

Mexico

From Paul Eggert (2001-03-05):
The Investigation and Analysis Service of the
Mexican Library of Congress (MLoC) has published a

history of Mexican local time (in Spanish)
.

Here are the discrepancies between Shanks & Pottenger (S&P) and the MLoC.
(In all cases we go with the MLoC.)
S&P report that Baja was at -8:00 in 1922/1923.
S&P say the 1930 transition in Baja was 1930-11-16.
S&P report
no DST during summer 1931.
S&P report a transition at 1932-03-30 23:00, not 1932-04-01.

From Gwillim Law (2001-02-20):
There are some other discrepancies between the Decrees page and the
tz database. I think they can best be explained by supposing that
the researchers who prepared the Decrees page failed to find some of

the relevant documents.

From Alan Perry (1996-02-15):

A guy from our Mexico subsidiary finally found the Presidential Decree
outlining the timezone changes in Mexico.

#

----- Begin Forwarded Message -----

#

I finally got my hands on the Official Presidential Decree that sets up the
rules for the DST changes. The rules are:

#

1. The country is divided in 3 timezones:

- Baja California Norte (the Mexico/BajaNorte TZ)

- Baja California Sur, Nayarit, Sinaloa and Sonora (the Mexico/BajaSur TZ)

- The rest of the country (the Mexico/General TZ)

#

2. From the first Sunday in April at 2:00 AM to the last Sunday in
October

at 2:00 AM, the times in each zone are as follows:

BajaNorte: GMT+7

BajaSur: GMT+6

General: GMT+5

#

3. The rest of the year, the times are as follows:

BajaNorte: GMT+8

BajaSur: GMT+7

General: GMT+6

#

The Decree was published in Mexico's Official Newspaper on January 4th.

#

----- End Forwarded Message -----

From Paul Eggert (1996-06-12):

For an English translation of the decree, see

``Diario Oficial: Time Zone Changeover" (1996-01-04).

From Rives McDow (1998-10-08):

The State of Quintana Roo has reverted back to central STD and DST times

(i.e. UTC -0600 and -0500 as of 1998-08-02).

From Rives McDow (2000-01-10):

Effective April 4, 1999 at 2:00 AM local time, Sonora changed to the time

zone 5 hours from the International Date Line, and will not observe daylight

savings time so as to stay on the same time zone as the southern

part of

Arizona year round.

From Jesper Norgaard, translating
<<http://www.reforma.com/nacional/articulo/064327/>> (2001-01-17):
In Oaxaca, the 55,000 teachers from the Section 22 of the National
Syndicate of Education Workers, refuse to apply daylight saving each
year, so that the more than 10,000 schools work at normal hour the
whole year.

From Gwillim Law (2001-01-19):
<http://www.reforma.com/negocios_y_dinero/articulo/064481/> ... says
(translated):...
January 17, 2000 - The Energy Secretary, Ernesto Martens, announced
that Summer Time will be reduced from seven to five months, starting
this year....
<<http://www.publico.com.mx/scripts/texto3.asp?action=pagina&pag=21&pos=p&secc=naci&date=01/17/2001>>
[translated], says "summer time will ... take effect on the first Sunday
in May, and end on the last Sunday of September.

From Arthur David Olson (2001-01-25):
The 2001-01-24 traditional Washington Post contained the page one
story "Timely Issue
Divides Mexicans."...
<http://www.washingtonpost.com/wp-dyn/articles/A37383-2001Jan23.html>
... Mexico City Mayor Lopez Obrador "...is threatening to keep
Mexico City and its 20 million residents on a different time than
the rest of the country..." In particular, Lopez Obrador would abolish
observation of Daylight Saving Time.

<[a href="http://www.conae.gob.mx/ahorro/decretohorver2001.html#decre"](http://www.conae.gob.mx/ahorro/decretohorver2001.html#decre)>
Official statute published by the Energy Department
 (2001-02-01) shows Baja and Chihuahua as still using US DST rules,
and Sonora with no DST. This was reported by Jesper Norgaard (2001-02-03).

From Paul Eggert (2001-03-03):

<[a href="http://www.latimes.com/news/nation/20010303/t000018766.html"](http://www.latimes.com/news/nation/20010303/t000018766.html)>
James F. Smith writes in today's LA Times

* Sonora will continue to observe standard time.
* Last week Mexico City's mayor Andres Manuel Lopez Obrador decreed that
the Federal District will not adopt DST.
* 4 of 16 district leaders announced they'll ignore
the decree.
* The decree does not affect federal-controlled facilities including
the airport, banks, hospitals, and schools.

For now we'll assume that the Federal District will bow to federal rules.

From Jesper Norgaard (2001-04-01):

I found some references to the Mexican application of daylight
saving, which modifies what I had already sent you, stating earlier
that a number of northern Mexican states would go on daylight
saving. The modification reverts this to only cover Baja California
(Norte), while all other states (except Sonora, who has no daylight
saving all year) will follow the original decree of president
Vicente Fox, starting daylight saving May 6, 2001 and ending
September 30, 2001.
References: "Diario de Monterrey" <www.diariodemonterrey.com/index.asp>
Palabra <<http://palabra.infosel.com/010331/primer/ppri3101.pdf>> (2001-03-31)

From Reuters (2001-09-04):
Mexico's Supreme Court on Tuesday declared that daylight savings was
unconstitutional
in Mexico City, creating the possibility the
capital will be in a different time zone from the rest of the nation
next year.... The Supreme Court's ruling takes effect at 2:00
a.m. (0800 GMT) on Sept. 30, when Mexico is scheduled to revert to
standard time. "This is so residents of the Federal District are not
subject to unexpected time changes," a statement from the court said.

From Jesper Norgaard Welen (2002-03-12):
... consulting my local grocery store(!) and my coworkers, they all insisted
that a new decision had been made to reinstate US style DST in Mexico....
http://www.conae.gob.mx/ahorro/horaver2001_m1_2002.html (2002-02-20)
confirms this. Sonora as usual is the only state where DST is not applied.

From Steffen Thorsen (2009-12-28):

Steffen Thorsen wrote:
> Mexico's House of Representatives has approved a proposal for northern
> Mexico's border cities to share the same daylight saving schedule as
> the United States.
Now this has
passed both the Congress and the Senate, so starting from
2010, some border regions will be the same:

<http://www.signonsandiego.com/news/2009/dec/28/clocks-will-match-both-sides-border/>

<a
href="http://www.elmananarey.com/diario/noticia/nacional/noticias/empatan_horario_de_frontera_con_eu/621939"
>
http://www.elmananarey.com/diario/noticia/nacional/noticias/empatan_horario_de_frontera_con_eu/621939

(Spanish)

Could not find the new law text, but the proposed law text changes are here:


```

# http://gaceta.diputados.gob.mx/Gaceta/61/2009/dic/20091210-V.pdf
# </a>
# (Gaceta Parlamentaria)
#
# There is also a list of the votes here:
# <a href="http://gaceta.diputados.gob.mx/Gaceta/61/2009/dic/V2-101209.html">
# http://gaceta.diputados.gob.mx/Gaceta/61/2009/dic/V2-101209.html
# </a>
#
# Our page:
#
<a href="http://www.timeanddate.com/news/time/north-mexico-dst-change.html">
# http://www.timeanddate.com/news/time/north-mexico-dst-change.html
# </a>

# From Arthur David Olson (2010-01-20):
# The page
# <a href="http://dof.gob.mx/nota_detalle.php?codigo=5127480&fecha=06/01/2010">
# http://dof.gob.mx/nota_detalle.php?codigo=5127480&fecha=06/01/2010
# </a>
# includes this text:
# En los municipios fronterizos de Tijuana y Mexicali en Baja California;
# Juarez y Ojinaga en Chihuahua; Acuña y Piedras Negras en Coahuila;
# Anahuac en Nuevo León; y Nuevo Laredo, Reynosa y Matamoros en
# Tamaulipas, la aplicación de este horario estacional surtirá efecto
# desde las dos horas del segundo domingo de marzo y concluirá a las dos
# horas del primer domingo de noviembre.
# En los municipios fronterizos que se encuentren ubicados en la franja
# fronteriza norte en el territorio comprendido entre la línea
# internacional y la línea
# paralela ubicada a una distancia de veinte
# kilómetros, así como la Ciudad de Ensenada, Baja California, hacia el
# interior del país, la aplicación de este horario estacional surtirá
# efecto desde las dos horas del segundo domingo de marzo y concluirá a
# las dos horas del primer domingo de noviembre.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Mexico 1939 only - Feb 5 0:00 1:00 D
Rule Mexico 1939 only - Jun 25 0:00 0 S
Rule Mexico 1940 only - Dec 9 0:00 1:00 D
Rule Mexico 1941 only - Apr 1 0:00 0 S
Rule Mexico 1943 only - Dec 16 0:00 1:00 W # War
Rule Mexico 1944 only - May 1 0:00 0 S
Rule Mexico 1950 only - Feb 12 0:00 1:00 D
Rule Mexico 1950 only - Jul 30 0:00 0 S
Rule Mexico 1996 2000 - Apr Sun>=1 2:00 1:00 D
Rule Mexico 1996 2000 - Oct lastSun 2:00 0 S
Rule Mexico 2001 only - May Sun>=1 2:00 1:00 D

```

Rule Mexico 2001 only - Sep lastSun 2:00 0 S
 Rule Mexico 2002 max - Apr Sun>=1 2:00 1:00 D
 Rule Mexico 2002 max - Oct lastSun 2:00 0 S
 #
 Zone NAME GMTOFF RULES FORMAT [UNTIL]
 # Quintana Roo
 Zone America/Cancun -5:47:04 - LMT 1922 Jan 1 0:12:56
 -6:00 - CST 1981 Dec 23
 -5:00 Mexico E%sT 1998 Aug 2 2:00
 -6:00 Mexico C%sT
 # Campeche, Yucatan
 Zone America/Merida -5:58:28 - LMT 1922 Jan 1 0:01:32
 -6:00 - CST 1981 Dec 23
 -5:00 - EST 1982 Dec 2
 -6:00 Mexico C%sT
 # Coahuila, Durango, Nuevo Leon, Tamaulipas (near US border)
 Zone America/Matamoros -6:40:00 - LMT 1921 Dec 31 23:20:00
 -6:00 - CST 1988
 -6:00 US C%sT 1989
 -6:00 Mexico C%sT 2010
 -6:00 US C%sT
 # Coahuila, Durango, Nuevo Leon, Tamaulipas (away from US border)
 Zone America/Monterrey -6:41:16 - LMT 1921 Dec 31 23:18:44
 -6:00 - CST 1988
 -6:00 US C%sT 1989
 -6:00 Mexico C%sT
 # Central Mexico
 Zone America/Mexico_City -6:36:36 - LMT 1922 Jan 1 0:23:24
 -7:00 - MST 1927 Jun 10 23:00
 -6:00 - CST 1930 Nov 15
 -7:00 - MST 1931 May 1 23:00
 -6:00 - CST 1931 Oct
 -7:00 - MST 1932 Apr 1
 -6:00 Mexico C%sT 2001 Sep
 30 02:00
 -6:00 - CST 2002 Feb 20
 -6:00 Mexico C%sT
 # Chihuahua (near US border)
 Zone America/Ojinaga -6:57:40 - LMT 1922 Jan 1 0:02:20
 -7:00 - MST 1927 Jun 10 23:00
 -6:00 - CST 1930 Nov 15
 -7:00 - MST 1931 May 1 23:00
 -6:00 - CST 1931 Oct
 -7:00 - MST 1932 Apr 1
 -6:00 - CST 1996
 -6:00 Mexico C%sT 1998
 -6:00 - CST 1998 Apr Sun>=1 3:00
 -7:00 Mexico M%sT 2010

-7:00 US M%ST
Chihuahua (away from US border)
Zone America/Chihuahua -7:04:20 - LMT 1921 Dec 31 23:55:40
-7:00 - MST 1927 Jun 10 23:00
-6:00 - CST 1930 Nov 15
-7:00 - MST 1931 May 1 23:00
-6:00 - CST 1931 Oct
-7:00 - MST 1932 Apr 1
-6:00 - CST 1996
-6:00 Mexico C%ST 1998
-6:00 - CST 1998 Apr Sun>=1 3:00
-7:00 Mexico M%ST

Sonora
Zone America/Hermosillo -7:23:52 - LMT 1921 Dec 31 23:36:08
-7:00 - MST 1927 Jun 10 23:00
-6:00 - CST 1930 Nov 15
-7:00 - MST 1931 May 1 23:00
-6:00 - CST 1931 Oct
-7:00 - MST 1932 Apr 1
-6:00 - CST 1942 Apr 24
-7:00 - MST 1949
Jan 14
-8:00 - PST 1970
-7:00 Mexico M%ST 1999
-7:00 - MST

From Alexander Krivenyshev (2010-04-21):
According to news, Bahía de Banderas (Mexican state of Nayarit)
changed time zone UTC-7 to new time zone UTC-6 on April 4, 2010 (to
share the same time zone as nearby city Puerto Vallarta, Jalisco).

(Spanish)
Bahía de Banderas homologa su horario al del centro del
país, a partir de este domingo

http://www.nayarit.gob.mx/notes.asp?id=20748

Bahía de Banderas homologa su horario con el del Centro del
País

http://www.bahiadebanderas.gob.mx/principal/index.php?option=com_content&view=article&id=261:bahia-de-banderas-homologa-su-horario-con-el-del-centro-del-pais&catid=42:comunicacion-social&Itemid=50"

#

```

# (English)
# Puerto Vallarta and Bahí;a de Banderas: One Time Zone
# <a href="http://virtualvallarta.com/puertovallarta/puertovallarta/localnews/2009-12-03-Puerto-Vallarta-and-Bahia-de-Banderas-One-Time-Zone.shtml">
# http://virtualvallarta.com/puertovallarta/puertovallarta/localnews/2009-12-03-Puerto-Vallarta-and-Bahia-de-Banderas-One-Time-Zone.shtml
# </a>
#
# or
# <a href="http://www.worldtimezone.com/dst_news/dst_news_mexico08.html">
# http://www.worldtimezone.com/dst_news/dst_news_mexico08.html
# </a>
#
# "Mexico's Senate approved the amendments to the Mexican Schedule System that
# will allow Bahí;a de Banderas and Puerto Vallarta to share the same time
# zone ..."
# Baja California Sur, Nayarit, Sinaloa

# From Arthur David Olson (2010-05-01):
# Use "Bahia_Banderas" to keep the name to fourteen characters.

```

Zone America/Mazatlan -7:05:40 - LMT 1921 Dec 31 23:54:20

```

-7:00 - MST 1927 Jun 10 23:00
-6:00 - CST 1930

```

Nov 15

```

-7:00 - MST 1931 May 1 23:00
-6:00 - CST 1931 Oct
-7:00 - MST 1932 Apr 1
-6:00 - CST 1942 Apr 24
-7:00 - MST 1949 Jan 14
-8:00 - PST 1970
-7:00 Mexico M%ST

```

Zone America/Bahia_Banderas -7:01:00 - LMT 1921 Dec 31 23:59:00

```

-7:00 - MST 1927 Jun 10 23:00
-6:00 - CST 1930 Nov 15
-7:00 - MST 1931 May 1 23:00
-6:00 - CST 1931 Oct
-7:00 - MST 1932 Apr 1
-6:00 - CST 1942 Apr 24
-7:00 - MST 1949 Jan 14
-8:00 - PST 1970
-7:00 Mexico M%ST 2010 Apr 4 2:00
-6:00 Mexico C%ST

```

Baja California (near US border)

Zone America/Tijuana -7:48:04 - LMT 1922 Jan 1 0:11:56

```

-7:00 - MST 1924

```

-8:00 - PST 1927 Jun 10 23:00
 -7:00 - MST 1930 Nov 15
 -8:00 - PST 1931 Apr 1
 -8:00 1:00 PDT 1931 Sep 30
 -8:00 - PST 1942 Apr 24
 -8:00 1:00 PWT 1945 Aug 14 23:00u
 -8:00 1:00 PPT 1945 Nov 12 # Peace
 -8:00 - PST 1948 Apr 5
 -8:00 1:00 PDT 1949 Jan 14
 -8:00 - PST 1954
 -8:00 CA P%sT 1961
 -8:00 - PST 1976
 -8:00 US P%sT 1996
 -8:00 Mexico P%sT 2001
 -8:00 US P%sT 2002
 Feb 20
 -8:00 Mexico P%sT 2010
 -8:00 US P%sT
 # Baja California (away from US border)
 Zone America/Santa_Isabel -7:39:28 - LMT 1922 Jan 1 0:20:32
 -7:00 - MST 1924
 -8:00 - PST 1927 Jun 10 23:00
 -7:00 - MST 1930 Nov 15
 -8:00 - PST 1931 Apr 1
 -8:00 1:00 PDT 1931 Sep 30
 -8:00 - PST 1942 Apr 24
 -8:00 1:00 PWT 1945 Aug 14 23:00u
 -8:00 1:00 PPT 1945 Nov 12 # Peace
 -8:00 - PST 1948 Apr 5
 -8:00 1:00 PDT 1949 Jan 14
 -8:00 - PST 1954
 -8:00 CA P%sT 1961
 -8:00 - PST 1976
 -8:00 US P%sT 1996
 -8:00 Mexico P%sT 2001
 -8:00 US P%sT 2002 Feb 20
 -8:00 Mexico P%sT
 # From Paul Eggert (2006-03-22):
 # Formerly there was an America/Ensenada zone, which differed from
 # America/Tijuana only in that it did not observe DST from 1976
 # through 1995. This was as per Shanks (1999). But Shanks & Pottenger say
 # Ensenada did not observe DST from 1948 through 1975. Guy Harris reports
 # that the
 # 1987 OAG says "Only Ensenada, Mexicale, San Felipe and
 # Tijuana observe DST," which agrees with Shanks & Pottenger but implies that
 # DST-observance was a town-by-town matter back then. This concerns
 # data after 1970 so most likely there should be at least one Zone
 # other than America/Tijuana for Baja, but it's not clear yet what its

name or contents should be.

#

Revillagigedo Is

no information

#####

Anguilla

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Anguilla -4:12:16 - LMT 1912 Mar 2

-4:00 - AST

Antigua and Barbuda

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Antigua -4:07:12 - LMT 1912 Mar 2

-5:00 - EST 1951

-4:00 - AST

Bahamas

#

For 1899 Milne gives -5:09:29.5; round that.

#

From Sue Williams (2006-12-07):

The Bahamas announced about a month ago that they plan to change their DST

rules to sync with the U.S. starting in 2007....

<http://www.jonesbahamas.com/?c=45&a=10412>

#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Bahamas 1964 1975 - Oct lastSun 2:00 0 S

Rule Bahamas 1964 1975 - Apr lastSun 2:00 1:00 D

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Nassau -5:09:30 - LMT 1912 Mar 2

-5:00 Bahamas E%sT 1976

-5:00 US E%sT

Barbados

For 1899 Milne gives -3:58:29.2; round that.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Barb 1977 only - Jun 12 2:00 1:00 D

Rule Barb 1977 1978 - Oct Sun>=1 2:00 0 S

Rule Barb 1978 1980 - Apr Sun>=15 2:00 1:00 D

Rule Barb 1979 only - Sep 30 2:00 0 S

Rule Barb 1980 only - Sep 25 2:00 0 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Barbados -3:58:29 - LMT 1924 # Bridgetown

-3:58:29 - BMT 1932 # Bridgetown Mean Time

-4:00 Barb A%sT

Belize

Whitman entirely disagrees with Shanks; go with Shanks & Pottenger.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Belize 1918 1942 - Oct Sun>=2 0:00 0:30 HD

Rule Belize 1919 1943 - Feb Sun>=9 0:00 0 S

Rule Belize 1973 only - Dec

5 0:00 1:00 D

Rule Belize 1974 only - Feb 9 0:00 0 S

Rule Belize 1982 only - Dec 18 0:00 1:00 D

Rule Belize 1983 only - Feb 12 0:00 0 S

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Belize -5:52:48 - LMT 1912 Apr

-6:00 Belize C%sT

Bermuda

For 1899 Milne gives -4:19:18.3 as the meridian of the clock tower,

Bermuda dockyard, Ireland I; round that.

From Dan Jones, reporting in The Royal Gazette (2006-06-26):

Next year, however, clocks in the US will go forward on the second Sunday

in March, until the first Sunday in November. And, after the Time Zone

(Seasonal Variation) Bill 2006 was passed in the House of Assembly on

Friday, the same thing will happen in Bermuda.

<http://www.theroyalgazette.com/apps/pbcs.dll/article?AID=/20060529/NEWS/105290135>

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Atlantic/Bermuda -4:19:18 - LMT 1930 Jan 1 2:00 # Hamilton

-4:00 - AST 1974 Apr 28 2:00

-4:00 Bahamas A%sT 1976

-4:00 US A%sT

#

Cayman Is

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone America/Cayman -5:25:32 - LMT 1890 # Georgetown

-5:07:12 - KMT 1912 Feb # Kingston Mean Time

-5:00 - EST

Costa Rica

Milne gives -5:36:13.3 as San Jose mean time; round to nearest.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule CR 1979 1980 - Feb lastSun 0:00 1:00 D
 Rule CR 1979 1980 - Jun Sun>=1 0:00 0 S
 Rule CR 1991 1992 - Jan Sat>=15 0:00 1:00 D
 # IATA SSIM (1991-09) says the following was at 1:00;
 # go with Shanks & Pottenger.
 Rule CR 1991 only - Jul 1 0:00 0 S
 Rule CR 1992 only - Mar 15 0:00 0 S
 # There are too many San Joses elsewhere, so we'll use `Costa Rica'.
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone America/Costa_Rica -5:36:13 - LMT 1890 # San Jose
 -5:36:13 - SJMT 1921 Jan 15 # San Jose Mean Time
 -6:00 CR C%sT
 # Coco
 # no information; probably like America/Costa_Rica

 # Cuba

 # From Paul Eggert (2013-02-21):
 # Milne gives -5:28:50.45 for the observatory at Havana, -5:29:23.57
 # for the
 port, and -5:30 for meteorological observations.
 # For now, stick with Shanks & Pottenger.

 # From Arthur David Olson (1999-03-29):
 # The 1999-03-28 exhibition baseball game held in Havana, Cuba, between
 # the Cuban National Team and the Baltimore Orioles was carried live on
 # the Orioles Radio Network, including affiliate WTOP in Washington, DC.
 # During the game, play-by-play announcer Jim Hunter noted that
 # "We'll be losing two hours of sleep...Cuba switched to Daylight Saving
 # Time today." (The "two hour" remark referred to losing one hour of
 # sleep on 1999-03-28--when the announcers were in Cuba as it switched
 # to DST--and one more hour on 1999-04-04--when the announcers will have
 # returned to Baltimore, which switches on that date.)

 # From Evert van der Veer via Steffen Thorsen (2004-10-28):
 # Cuba is not going back to standard time this year.
 # From Paul Eggert (2006-03-22):
 # <http://www.granma.cu/ingles/2004/septiembre/juev30/41medid-i.html>
 # says that it's due to a problem
 at the Antonio Guiteras
 # thermoelectric plant, and says "This October there will be no return
 # to normal hours (after daylight saving time)".
 # For now, let's assume that it's a temporary measure.

 # From Carlos A. Carnero Delgado (2005-11-12):
 # This year (just like in 2004-2005) there's no change in time zone
 # adjustment in Cuba. We will stay in daylight saving time:
 # <http://www.granma.cu/espanol/2005/noviembre/mier9/horario.html>

From Jesper Norgaard Welen (2006-10-21):
An article in GRANMA INTERNACIONAL claims that Cuba will end
the 3 years of permanent DST next weekend, see
<http://www.granma.cu/ingles/2006/octubre/lun16/43horario.html>
"On Saturday night, October 28 going into Sunday, October 29, at 01:00,
watches should be set back one hour -- going back to 00:00 hours -- returning
to the normal schedule....

From Paul Eggert (2007-03-02):
<http://www.granma.cubaweb.cu/english/news/art89.html>, dated yesterday,
says Cuban clocks will advance at midnight
on March 10.
For lack of better information, assume Cuba will use US rules,
except that it switches at midnight standard time as usual.
#

From Steffen Thorsen (2007-10-25):
Carlos Alberto Fonseca Arauz informed me that Cuba will end DST one week
earlier - on the last Sunday of October, just like in 2006.
#

He supplied these references:

<http://www.prensalatina.com.mx/article.asp?ID=%7B4CC32C1B-A9F7-42FB-8A07-8631AFC923AF%7D&language=ES>
http://actualidad.terra.es/sociedad/articulo/cuba_llama_ahorrar_energia_cambio_1957044.htm
#

From Alex Kryvenishev (2007-10-25):
Here is also article from Granma (Cuba):

[Regira] el Horario Normal desde el [proximo] domingo 28 de octubre
<http://www.granma.cubaweb.cu/2007/10/24/nacional/artic07.html>

http://www.worldtimezone.com/dst_news/dst_news_cuba03.html

From Arthur David Olson (2008-03-09):
I'm in Maryland which is now observing United States Eastern Daylight
Time. At 9:44 local time I used RealPlayer to listen to

<http://media.enet.cu/radioreloj>
<http://media.enet.cu/radioreloj>
<http://media.enet.cu/radioreloj>, a Cuban information station, and heard
the time announced as "ocho cuarenta y cuatro" ("eight forty-four"),
indicating that Cuba is still on standard time.

From Steffen Thorsen (2008-03-12):
It seems that Cuba will start DST on Sunday, 2007-03-16..
It was announced yesterday, according to this source (in Spanish):
<http://www.nnc.cubaweb.cu/marzo-2008/cien-1-11-3-08.htm>

```
# http://www.nnc.cubaweb.cu/marzo-2008/cien-1-11-3-08.htm
# </a>
#
# Some more background information is posted here:
# <a href="http://www.timeanddate.com/news/time/cuba-starts-dst-march-16.html">
# http://www.timeanddate.com/news/time/cuba-starts-dst-march-16.html
# </a>
#
# The article also says that Cuba has been observing DST since 1963,
# while Shanks (and tzdata) has 1965 as the first date (except in the
# 1940's). Many other web pages in Cuba also claim that it has been
# observed since 1963, but with
# the exception of 1970 - an exception
# which is not present in tzdata/Shanks. So there is a chance we need to
# change some historic records as well.
#
# One example:
# <a href="http://www.radiohc.cu/espanol/noticias/mar07/11mar/hor.htm">
# http://www.radiohc.cu/espanol/noticias/mar07/11mar/hor.htm
# </a>

# From Jesper Norgaard Welen (2008-03-13):
# The Cuban time change has just been confirmed on the most authoritative
# web site, the Granma. Please check out
# <a href="http://www.granma.cubaweb.cu/2008/03/13/nacional/artic10.html">
# http://www.granma.cubaweb.cu/2008/03/13/nacional/artic10.html
# </a>
#
# Basically as expected after Steffen Thorsens information, the change
# will take place midnight between Saturday and Sunday.

# From Arthur David Olson (2008-03-12):
# Assume Sun>=15 (third Sunday) going forward.

# From Alexander Krivenyshev (2009-03-04)
# According to the Radio Reloj - Cuba will start Daylight Saving Time on
# midnight between Saturday, March 07, 2009 and Sunday,
# March 08, 2009-
# not on midnight March 14 / March 15 as previously thought.
#
# <a href="http://www.worldtimezone.com/dst_news/dst_news_cuba05.html">
# http://www.worldtimezone.com/dst_news/dst_news_cuba05.html
# (in Spanish)
# </a>

# From Arthur David Olson (2009-03-09)
# I listened over the Internet to
# <a href="http://media.enet.cu/readioreloj">
```

<http://media.enet.cu/readioreloj>

this morning; when it was 10:05 a. m. here in Bethesda, Maryland the
the time was announced as "diez cinco"--the same time as here, indicating
that has indeed switched to DST. Assume second Sunday from 2009 forward.

From Steffen Thorsen (2011-03-08):
Granma announced that Cuba is going to start DST on 2011-03-20 00:00:00
this year. Nothing about the end date known so far (if that has
changed at all).

Source:

<http://granma.co.cu/2011/03/08/nacional/artic01.html>

Our info:

<http://www.timeanddate.com/news/time/cuba-starts-dst-2011.html>

From Steffen Thorsen (2011-10-30)
Cuba will end DST two weeks later this year. Instead of going back
tonight, it has been delayed to 2011-11-13 at 01:00.

One source (Spanish)

<http://www.radioangulo.cu/noticias/cuba/17105-cuba-restablecera-el-horario-del-meridiano-de-greenwich.html>

Our page:

<http://www.timeanddate.com/news/time/cuba-time-changes-2011.html>

From Steffen Thorsen (2012-03-01)
According to Radio Reloj, Cuba will start DST on Midnight between March
31 and April 1.

Radio Reloj has the following info (Spanish):

<http://www.radioreloj.cu/index.php/noticias-radio-reloj/71-miscelaneas/7529-cuba-aplicara-el-horario-de-verano-desde-el-1-de-abril>


```

#
# Our info on it:
# <a href="http://www.timeanddate.com/news/time/cuba-starts-dst-2012.html">
# http://www.timeanddate.com/news/time/cuba-starts-dst-2012.html
# </a>

# From Steffen Thorsen (2012-11-03):
# Radio Reloj and many other sources report that Cuba is changing back
# to standard time on 2012-11-04:
# http://www.radioreloj.cu/index.php/noticias-radio-reloj/36-nacionales/9961-regira-horario-normal-en-cuba-desde-
el-domingo-cuatro-de-noviembre
# From Paul Eggert (2012-11-03):
# For now, assume the future rule is first Sunday in November.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Cuba 1928 only - Jun 10 0:00 1:00 D
Rule Cuba 1928 only - Oct 10 0:00 0 S
Rule Cuba 1940 1942 - Jun Sun>=1 0:00 1:00 D
Rule Cuba 1940 1942 - Sep Sun>=1 0:00 0 S
Rule Cuba 1945 1946 - Jun Sun>=1 0:00 1:00 D
Rule Cuba 1945 1946 - Sep Sun>=1 0:00 0 S
Rule Cuba 1965 only - Jun 1 0:00 1:00 D
Rule Cuba 1965 only - Sep 30 0:00 0 S
Rule Cuba 1966 only - May 29 0:00 1:00 D
Rule Cuba 1966 only - Oct 2 0:00 0 S
Rule Cuba 1967 only - Apr 8 0:00 1:00 D
Rule Cuba 1967 1968 - Sep Sun>=8 0:00 0 S
Rule Cuba 1968 only - Apr 14 0:00 1:00 D
Rule Cuba 1969 1977 - Apr lastSun 0:00 1:00 D
Rule Cuba 1969 1971 - Oct lastSun 0:00 0 S
Rule Cuba 1972 1974 - Oct 8 0:00 0 S
Rule Cuba 1975 1977 - Oct lastSun 0:00 0 S
Rule Cuba 1978 only - May 7 0:00 1:00 D
Rule Cuba 1978 1990 - Oct Sun>=8 0:00 0 S
Rule Cuba 1979 1980 - Mar Sun>=15 0:00 1:00 D
Rule Cuba 1981 1985 - May Sun>=5 0:00 1:00 D
Rule Cuba 1986 1989 - Mar Sun>=14 0:00 1:00 D
Rule Cuba 1990 1997 - Apr Sun>=1 0:00 1:00 D
Rule Cuba 1991 1995 - Oct Sun>=8 0:00s 0 S
Rule Cuba 1996 only - Oct
6 0:00s 0 S
Rule Cuba 1997 only - Oct 12 0:00s 0 S
Rule Cuba 1998 1999 - Mar lastSun 0:00s 1:00 D
Rule Cuba 1998 2003 - Oct lastSun 0:00s 0 S
Rule Cuba 2000 2004 - Apr Sun>=1 0:00s 1:00 D
Rule Cuba 2006 2010 - Oct lastSun 0:00s 0 S
Rule Cuba 2007 only - Mar Sun>=8 0:00s 1:00 D
Rule Cuba 2008 only - Mar Sun>=15 0:00s 1:00 D

```

Rule Cuba 2009 2010 - Mar Sun>=8 0:00s 1:00 D
Rule Cuba 2011 only - Mar Sun>=15 0:00s 1:00 D
Rule Cuba 2011 only - Nov 13 0:00s 0 S
Rule Cuba 2012 only - Apr 1 0:00s 1:00 D
Rule Cuba 2012 max - Nov Sun>=1 0:00s 0 S
Rule Cuba 2013 max - Mar Sun>=8 0:00s 1:00 D

#

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Havana -5:29:28 - LMT 1890
-5:29:36 - HMT 1925 Jul 19 12:00 # Havana MT
-5:00 Cuba C%ST

Dominica

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Dominica -4:05:36 - LMT 1911 Jul 1 0:01 # Roseau
-4:00 - AST

Dominican Republic

From Steffen Thorsen (2000-10-30):
Enrique Morales reported to me that the Dominican Republic has changed the
time zone to Eastern Standard Time as of Sunday 29 at 2 am....
<http://www.listin.com.do/antes/261000/republica/princi.html>

From Paul Eggert (2000-12-04):
That URL (2000-10-26, in Spanish)
says they planned to use US-style DST.

From Rives McDow (2000-12-01):
Dominican Republic changed its mind and presidential decree on Tuesday,
November 28, 2000, with a new decree. On Sunday, December 3 at 1:00 AM the
Dominican Republic will be reverting to 8 hours from the International Date
Line, and will not be using DST in the foreseeable future. The reason they
decided to use DST was to be in synch with Puerto Rico, who was also going
to implement DST. When Puerto Rico didn't implement DST, the president
decided to revert.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule DR 1966 only - Oct 30 0:00 1:00 D
Rule DR 1967 only - Feb 28 0:00 0 S
Rule DR 1969 1973 - Oct lastSun 0:00 0:30 HD
Rule DR 1970 only - Feb 21 0:00 0 S
Rule DR 1971 only - Jan 20 0:00 0 S
Rule DR 1972 1974 - Jan 21 0:00 0 S
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Santo_Domingo -4:39:36 - LMT 1890

-4:40 - SDMT 1933 Apr 1 12:00 # S. Dom. MT
-5:00 DR E%sT 1974 Oct 27
-4:00 - AST 2000
Oct 29 02:00
-5:00 US E%sT 2000 Dec 3 01:00
-4:00 - AST

El Salvador

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Salv 1987 1988 - May Sun>=1 0:00 1:00 D
Rule Salv 1987 1988 - Sep lastSun 0:00 0 S
There are too many San Salvadors elsewhere, so use America/El_Salvador
instead of America/San_Salvador.
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/El_Salvador -5:56:48 - LMT 1921 # San Salvador
-6:00 Salv C%sT

Grenada

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Grenada -4:07:00 - LMT 1911 Jul # St George's
-4:00 - AST

Guadeloupe

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Guadeloupe -4:06:08 - LMT 1911 Jun 8 # Pointe a Pitre
-4:00 - AST

St Barthelemy

Link America/Guadeloupe America/St_Barthelemy
St Martin (French part)
Link America/Guadeloupe America/Marigot

Guatemala

#

From Gwillim Law (2006-04-22), after a heads-up from Oscar van Vlijmen:

Diario Co Latino, at

<http://www.diariocolatino.com/internacionales/detalles.asp?NewsID=8079>,

#

says in an article dated 2006-04-19 that the Guatemalan government had

decided on that date to advance official time by 60 minutes, to lessen the

impact of the elevated cost of oil... Daylight saving time will last from

2006-04-29 24:00 (Guatemalan standard time) to 2006-09-30 (time unspecified).

From Paul Eggert (2006-06-22):

The Ministry of Energy and Mines, press release CP-15/2006

(2006-04-19), says DST ends at 24:00. See

http://www.sieca.org.gt/Sitio_publico/Energeticos/Doc/Medidas/Cambio_Horario_Nac_190406.pdf.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Guat 1973 only - Nov 25 0:00 1:00 D
Rule Guat 1974 only - Feb 24 0:00 0 S
Rule Guat 1983 only - May 21 0:00 1:00 D
Rule Guat 1983 only - Sep 22 0:00 0 S
Rule Guat 1991 only - Mar 23 0:00 1:00 D
Rule Guat 1991 only - Sep 7 0:00 0 S
Rule Guat 2006 only - Apr 30 0:00 1:00 D
Rule Guat 2006 only - Oct 1 0:00 0 S
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Guatemala -6:02:04
- LMT 1918 Oct 5
-6:00 Guat C%sT

Haiti

From Gwillim Law (2005-04-15):

Risto O. Nykanen wrote me that Haiti is now on DST.

I searched for confirmation, and I found a

[press release](http://www.haitianconsulate.org/time.doc)

on the Web page of the Haitian Consulate in Chicago (2005-03-31),

[Translated from French, it says:](#)

#

"The Prime Minister's Communication Office notifies the public in general

and the press in particular that, following a decision of the Interior

Ministry and the Territorial Collectivities [I suppose that means the

provinces], Haiti will move to Eastern Daylight Time in the night from next

Saturday the 2nd to Sunday the 3rd.

#

"Consequently, the Prime Minister's Communication Office wishes to inform

the population that the country's clocks will be set forward one hour

starting at midnight. This provision will hold until the last Saturday in

October 2005.

#

"Port-au-Prince, March

31, 2005"

#

From Steffen Thorsen (2006-04-04):

I have been informed by users that Haiti observes DST this year like

last year, so the current "only" rule for 2005 might be changed to a

"max" rule or to last until 2006. (Who knows if they will observe DST

next year or if they will extend their DST like US/Canada next year).

#

I have found this article about it (in French):

<http://www.haitipressnetwork.com/news.cfm?articleID=7612>

#

The reason seems to be an energy crisis.

From Stephen Colebourne (2007-02-22):

Some IATA info: Haiti won't be having DST in 2007.

From Steffen Thorsen (2012-03-11):
According to several news sources, Haiti will observe DST this year,
apparently using the same start and end date as USA/Canada.
So this means they have already changed their time.

<http://www.alterpresse.org/spip.php?article12510>
<http://radiovision2000haiti.net/home/?p=13253>

From Arthur David Olson (2012-03-11):
The alterpresse.org source seems to show
a US-style leap from 2:00 a.m. to
3:00 a.m. rather than the traditional Haitian jump at midnight.
Assume a US-style fall back as well.

From Steffen Thorsen (2013-03-10):
It appears that Haiti is observing DST this year as well, same rules
as US/Canada. They did it last year as well, and it looks like they
are going to observe DST every year now...

<http://radiovision2000haiti.net/public/haiti-avis-changement-dheure-dimanche/>
<http://www.canalplushaiti.net/?p=6714>

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Haiti 1983 only - May 8 0:00 1:00 D
Rule Haiti 1984 1987 - Apr lastSun 0:00 1:00 D
Rule Haiti 1983 1987 - Oct lastSun 0:00 0 S
Shanks & Pottenger say AT is 2:00, but IATA SSIM (1991/1997) says 1:00s.
Go with IATA.
Rule Haiti 1988 1997 - Apr Sun>=1 1:00s 1:00 D
Rule Haiti 1988 1997 - Oct lastSun 1:00s 0 S
Rule Haiti 2005 2006 - Apr Sun>=1 0:00 1:00 D
Rule Haiti 2005 2006 - Oct lastSun 0:00 0 S
Rule Haiti 2012 max - Mar Sun>=8 2:00 1:00 D
Rule Haiti 2012 max - Nov Sun>=1 2:00 0 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Port-au-Prince -4:49:20 - LMT 1890
-4:49 - PPMT 1917 Jan 24 12:00 # P-a-P MT
-5:00 Haiti E%sT

Honduras
Shanks & Pottenger say 1921 Jan 1; go with Whitman's more precise Apr 1.

From Paul Eggert (2006-05-05):
worldtimezone.com reports a 2006-05-02 Spanish-language AP article
saying Honduras will start using DST midnight Saturday, effective 4
months until September. La Tribuna reported today

<<http://www.latribuna.hn/99299.html>> that Manuel Zelaya, the president
of Honduras, refused to back down on this.

From Jesper Norgaard Welen (2006-08-08):

It seems that Honduras has returned from DST to standard time this Monday at
00:00 hours (prolonging Sunday to 25 hours duration).

http://www.worldtimezone.com/dst_news/dst_news_honduras04.html

From Paul Eggert (2006-08-08):

Also see Diario El Heraldo, The country returns to standard time (2006-08-08)

<<http://www.elheraldo.hn/nota.php?nid=54941&sec=12>>.

#

It mentions executive decree 18-2006.

From Steffen Thorsen (2006-08-17):

Honduras will observe DST from 2007 to 2009, exact dates are not

published, I have located this authoritative source:

<http://www.presidencia.gob.hn/noticia.aspx?nId=47>

From Steffen Thorsen (2007-03-30):

http://www.laprensahn.com/pais_nota.php?id04962=7386

So it seems that Honduras will not enter DST this year....

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Hond 1987 1988 - May Sun>=1 0:00 1:00 D

Rule Hond 1987 1988 - Sep lastSun 0:00 0 S

Rule Hond 2006 only - May Sun>=1 0:00 1:00 D

Rule Hond 2006 only - Aug Mon>=1 0:00 0 S

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Tegucigalpa -5:48:52 - LMT 1921 Apr

-6:00 Hond C%sT

#

Great Swan I ceded by US to Honduras in 1972

Jamaica

From Bob Devine (1988-01-28):

Follows US rules.

From U. S. Naval Observatory (1989-01-19):

JAMAICA 5 H BEHIND UTC

From Shanks & Pottenger:

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Jamaica -5:07:12

- LMT 1890 # Kingston

-5:07:12 - KMT 1912 Feb # Kingston Mean Time

-5:00 - EST 1974 Apr 28 2:00

-5:00 US E%ST 1984

-5:00 - EST

Martinique

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Martinique -4:04:20 - LMT 1890 # Fort-de-France

-4:04:20 - FFMT 1911 May # Fort-de-France MT

-4:00 - AST 1980 Apr 6

-4:00 1:00 ADT 1980 Sep 28

-4:00 - AST

Montserrat

From Paul Eggert (2006-03-22):

In 1995 volcanic eruptions forced evacuation of Plymouth, the capital.

world.gazetteer.com says Cork Hill is the most populous location now.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone America/Montserrat -4:08:52 - LMT 1911 Jul 1 0:01 # Cork Hill

-4:00 - AST

Nicaragua

#

This uses Shanks & Pottenger for times before 2005.

#

From Steffen Thorsen (2005-04-12):

I've got reports from 8 different people that Nicaragua just started

DST on Sunday 2005-04-10, in order to save energy because

of

expensive petroleum. The exact end date for DST is not yet

announced, only "September" but some sites also say "mid-September".

Some background information is available on the President's official site:

#

http://www.presidencia.gob.ni/Presidencia/Files_index/Secretaria/Notas%20de%20Prensa/Presidente/2005/ABRIL/Gobierno-de-nicaragua-adelanta-hora-oficial-06abril.htm

The Decree, no 23-2005 is available here:

[http://www.presidencia.gob.ni/buscador_gaceta/BD/DECRETOS/2005/Decreto%2023-](http://www.presidencia.gob.ni/buscador_gaceta/BD/DECRETOS/2005/Decreto%2023-2005%20Se%20adelanta%20en%20una%20hora%20en%20todo%20el%20territorio%20nacional%20apartir%20de%20las%2024horas%20del%2009%20de%20Abril.pdf)

[2005%20Se%20adelanta%20en%20una%20hora%20en%20todo%20el%20territorio%20nacional%20apartir%20de%20las%2024horas%20del%2009%20de%20Abril.pdf](http://www.presidencia.gob.ni/buscador_gaceta/BD/DECRETOS/2005/Decreto%2023-2005%20Se%20adelanta%20en%20una%20hora%20en%20todo%20el%20territorio%20nacional%20apartir%20de%20las%2024horas%20del%2009%20de%20Abril.pdf)

#

From Paul Eggert (2005-05-01):

The decree doesn't say anything about daylight saving, but for now let's

assume that it is daylight saving....

#

From Gwillim Law (2005-04-21):

The Associated Press story on the time change, which can be found at

#

http://www.lapalmainteractivo.com/guias/content/gen/ap/America_Latina/AMC_GEN_NICARAGUA_HORA.html

#

and elsewhere, says (fifth paragraph, translated from Spanish): "The last
time that a change of clocks was applied to save energy was in the year 2000
during the Arnaldo Aleman administration."...

The northamerica file says that Nicaragua has been on UTC-6 continuously
since December 1998. I wasn't able to find any details of Nicaraguan time
changes in 2000. Perhaps a note could be added to the northamerica file, to
the effect that we have indirect evidence that DST was observed in 2000.

#

From Jesper Norgaard Welen (2005-11-02):
Nicaragua left DST the 2005-10-02 at 00:00 (local time).
http://www.presidencia.gob.ni/presidencia/files_index/secretaria/comunicados/2005/septiembre/26septiembre-cambio-hora.htm
(2005-09-26)

#

From Jesper Norgaard Welen (2006-05-05):
<http://www.elnuevodiario.com.ni/2006/05/01/nacionales/18410>
(my informal translation)
By order of the president of the republic, Enrique Bolanos, Nicaragua
advanced by sixty minutes their official
time, yesterday at 2 in the
morning, and will stay that way until 30.th. of september.

#

From Jesper Norgaard Welen (2006-09-30):
http://www.presidencia.gob.ni/buscador_gaceta/BD/DECRETOS/2006/D-063-2006P-PRN-Cambio-Hora.pdf
My informal translation runs:
The natural sun time is restored in all the national territory, in that the
time is returned one hour at 01:00 am of October 1 of 2006.

#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Nic 1979 1980 - Mar Sun>=16 0:00 1:00 D
Rule Nic 1979 1980 - Jun Mon>=23 0:00 0 S
Rule Nic 2005 only - Apr 10 0:00 1:00 D
Rule Nic 2005 only - Oct Sun>=1 0:00 0 S
Rule Nic 2006 only - Apr 30 2:00 1:00 D
Rule Nic 2006 only - Oct Sun>=1 1:00 0 S

Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone America/Managua -5:45:08 - LMT 1890
-5:45:12 - MMT 1934 Jun 23 # Managua Mean Time?
-6:00 - CST 1973 May
-5:00 - EST 1975 Feb 16
-6:00 Nic C%sT 1992 Jan 1 4:00
-5:00 - EST 1992 Sep 24
-6:00 - CST 1993
-5:00 - EST 1997
-6:00 Nic C%sT

#

```

Panama
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Panama -5:18:08 - LMT 1890
-5:19:36 - CMT 1908 Apr 22 # Colon Mean Time
-5:00 - EST

# Puerto Rico
# There are too many San Juans elsewhere, so we'll use `Puerto_Rico'.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Puerto_Rico -4:24:25 - LMT 1899 Mar 28 12:00 # San Juan
-4:00 - AST 1942 May 3
-4:00 US A%sT 1946
-4:00 - AST

# St Kitts-Nevis
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/St_Kitts -4:10:52 - LMT 1912 Mar 2 # Basseterre
-4:00 - AST

# St Lucia
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/St_Lucia -4:04:00 - LMT 1890 # Castries
-4:04:00 - CMT 1912 # Castries Mean Time
-4:00 - AST

# St Pierre and Miquelon
# There are too many St Pierres elsewhere, so we'll use `Miquelon'.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Miquelon -3:44:40 - LMT 1911 May 15 # St Pierre
-4:00 - AST 1980 May
-3:00 - PMST 1987 # Pierre & Miquelon Time
-3:00 Canada PM%sT

#
St Vincent and the Grenadines
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/St_Vincent -4:04:56 - LMT 1890 # Kingstown
-4:04:56 - KMT 1912 # Kingstown Mean Time
-4:00 - AST

# Turks and Caicos
#
# From Chris Dunn in
# <http://bugs.debian.org/cgi-bin/bugreport.cgi?bug=415007>
# (2007-03-15): In the Turks & Caicos Islands (America/Grand_Turk) the
# daylight saving dates for time changes have been adjusted to match
# the recent U.S. change of dates.
#

```

```

# From Brian Inglis (2007-04-28):
# http://www.turksandcaicos.tc/calendar/index.htm [2007-04-26]
# there is an entry for Nov 4 "Daylight Savings Time Ends 2007" and three
# rows before that there is an out of date entry for Oct:
# "Eastern Standard Times Begins 2007
# Clocks are set back one hour at 2:00 a.m. local Daylight Saving Time"
# indicating that the normal ET rules are followed.
#
# From Paul Eggert (2006-05-01):
# Shanks & Pottenger say they use US DST rules, but IATA SSIM (1991/1998)
# says
# they switch at midnight. Go with Shanks & Pottenger.
#
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule TC 1979 1986 - Apr lastSun 2:00 1:00 D
Rule TC 1979 2006 - Oct lastSun 2:00 0 S
Rule TC 1987 2006 - Apr Sun>=1 2:00 1:00 D
Rule TC 2007 max - Mar Sun>=8 2:00 1:00 D
Rule TC 2007 max - Nov Sun>=1 2:00 0 S
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Grand_Turk -4:44:32 - LMT 1890
-5:07:12 - KMT 1912 Feb # Kingston Mean Time
-5:00 TC E%sT

# British Virgin Is
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Tortola -4:18:28 - LMT 1911 Jul # Road Town
-4:00 - AST

# Virgin Is
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/St_Thomas -4:19:44 - LMT 1911 Jul # Charlotte Amalie
-4:00 - AST

Found in path(s):
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/northamerica
No license file was found, but licenses were detected in source scan.

# <pre>
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.

# This data is by no means authoritative; if you think you know better,
# go ahead and edit the file (and please send any changes to
# tz@iana.org for general use in the future).

# From Paul Eggert (2006-03-22):

```

A good source for time zone historical data outside the U.S. is
Thomas G. Shanks and Rique Pottenger, The International Atlas (6th edition),
San Diego: ACS Publications, Inc. (2003).

Gwillim Law writes that a good source
for recent time zone data is the International Air Transport
Association's Standard Schedules Information Manual (IATA SSIM),
published semiannually. Law sent in several helpful summaries
of the IATA's data after 1990.

Except where otherwise noted, Shanks & Pottenger is the source for
entries through 1991, and IATA SSIM is the source for entries afterwards.

Other
sources occasionally used include:

Edward W. Whitman, World Time Differences,
Whitman Publishing Co, 2 Niagara Av, Ealing, London (undated),
which I found in the UCLA library.

http://www.pettswoodvillage.co.uk/Daylight_Savings_William_Willett.pdf>
William Willett, The Waste of Daylight, 19th edition
 (1914-03)

Milne J. Civil time. Geogr J. 1899 Feb;13(2):173-94
<<http://www.jstor.org/stable/1774359>>. He writes:
"It is requested that corrections and additions to these tables
may be sent to Mr. John Milne, Royal Geographical Society,
Savile Row, London." Nowadays please email them to tz@iana.org.

Brazil's Departamento Servico da Hora (DSH),
<http://pcdsh01.on.br/HISTHV.htm>>
History of Summer Time
 (1998-09-21, in Portuguese)

I invented the abbreviations marked `*' in the following table;
the rest are from earlier versions of this file, or from other sources.
Corrections are welcome!
std dst 2dst

LMT Local Mean Time
-4:00 AST ADT Atlantic
-3:00 WGT WGST Western Greenland*
-1:00 EGT EGST Eastern Greenland*
0:00 GMT BST BDST Greenwich, British Summer
0:00 GMT IST Greenwich, Irish Summer
0:00 WET WEST WEMT Western Europe

0:19:32.13 AMT NST Amsterdam, Netherlands Summer (1835-1937)*
0:20 NET NEST Netherlands (1937-1940)*
1:00 CET CEST CEMT Central Europe
1:00:14 SET Swedish (1879-1899)*
2:00 EET EEST Eastern Europe
3:00 MSK MSD Moscow
#

A reliable and entertaining source about time zones, especially in Britain,
Derek Howse, Greenwich time and longitude, Philip Wilson Publishers (1997).

From Peter Ilieve (1994-12-04),
The original six [EU members]: Belgium, France, (West) Germany, Italy,
Luxembourg, the Netherlands.
Plus,
from 1 Jan 73: Denmark, Ireland, United Kingdom.
Plus, from 1 Jan 81: Greece.
Plus, from 1 Jan 86: Spain, Portugal.
Plus, from 1 Jan 95: Austria, Finland, Sweden. (Norway negotiated terms for
entry but in a referendum on 28 Nov 94 the people voted No by 52.2% to 47.8%
on a turnout of 88.6%. This was almost the same result as Norway's previous
referendum in 1972, they are the only country to have said No twice.
Referendums in the other three countries voted Yes.)
...
Estonia ... uses EU dates but not at 01:00 GMT, they use midnight GMT.
I don't think they know yet what they will do from 1996 onwards.
...
There shouldn't be any [current members who are not using EU rules].
A Directive has the force of law, member states are obliged to enact
national law to implement it. The only contentious issue was the
different end date for the UK and Ireland, and this was always allowed
in the Directive.

#####

Britain (United Kingdom) and Ireland (Eire)

From Peter Ilieve (1994-07-06):

On 17 Jan 1994 the Independent, a UK quality newspaper, had a piece about
historical vistas along the Thames in west London. There was a photo
and a sketch map showing some of the sightlines involved. One paragraph
of the text said:

`An old stone obelisk marking a forgotten terrestrial meridian stands
beside the river at Kew. In the 18th century, before time and longitude
was standardised by the Royal Observatory in Greenwich, scholars observed

this stone and the movement of stars from Kew Observatory nearby. They
made their calculations and set the time for the Horse Guards and Parliament,
but now the stone is obscured by scrubwood and can only be seen by walking
along the towpath within a few yards of it.'

#

I have a one inch to one mile map of London and my estimate of the stone's
position is 51 deg. 28' 30" N, 0 deg. 18' 45" W. The longitude should

#

be within about +-2". The Ordnance Survey grid reference is TQ172761.

#

[This yields GMTOFF = -0:01:15 for London LMT in the 18th century.]

From Paul Eggert (1993-11-18):

#

Howse writes that Britain was the first country to use standard time.

The railways cared most about the inconsistencies of local mean time,

and it was they who forced a uniform time on the country.

The original idea was credited to Dr. William Hyde Wollaston (1766-1828)

and was popularized by Abraham Follett Osler (1808-1903).

The first railway to adopt London time was the Great Western Railway

in November 1840; other railways followed suit, and by 1847 most

(though not all) railways used London time. On 1847-09-22 the

Railway Clearing House, an industry standards body, recommended that GMT be

adopted at all stations as soon as the General Post Office permitted it.

The transition occurred on 12-01 for the L&NW, the Caledonian,

and presumably other railways; the January 1848 Bradshaw's lists

many

railways as using GMT. By 1855 the vast majority of public

clocks in Britain were set to GMT (though some, like the great clock

on Tom Tower at Christ Church, Oxford, were fitted with two minute hands,

one for local time and one for GMT). The last major holdout was the legal

system, which stubbornly stuck to local time for many years, leading

to oddities like polls opening at 08:13 and closing at 16:13.

The legal system finally switched to GMT when the Statutes (Definition

of Time) Act took effect; it received the Royal Assent on 1880-08-02.

#

In the tables below, we condense this complicated story into a single

transition date for London, namely 1847-12-01. We don't know as much

about Dublin, so we use 1880-08-02, the legal transition time.

From Paul Eggert (2003-09-27):

Summer Time was first seriously proposed by William Willett (1857-1915),

a London builder and member of the Royal Astronomical Society

who circulated a pamphlet "The Waste

of Daylight" (1907)

that proposed advancing clocks 20 minutes on each of four Sundays in April,

and retarding them by the same amount on four Sundays in September.

A bill was drafted in 1909 and introduced in Parliament several times,

but it met with ridicule and opposition, especially from farming interests.
Later editions of the pamphlet proposed one-hour summer time, and
it was eventually adopted as a wartime measure in 1916.
See: Summer Time Arrives Early, The Times (2000-05-18).
A monument to Willett was unveiled on 1927-05-21, in an open space in
a 45-acre wood near Chislehurst, Kent that was purchased by popular
subscription and open to the public. On the south face of the monolith,
designed by G. W. Miller, is the...William Willett Memorial Sundial,
which is permanently set to Summer Time.

From Winston Churchill (1934-04-28):
It is one of the paradoxes of history that we should owe the boon of
summer time, which gives every year to the people of
this country
between 160 and 170 hours more daylight leisure, to a war which
plunged Europe into darkness for four years, and shook the
foundations of civilization throughout the world.
-- <http://www.winstonchurchill.org/fh114willett.htm>
"A Silent Toast to William Willett", Pictorial Weekly

From Paul Eggert (1996-09-03):
The OED Supplement says that the English originally said ``Daylight Saving''
when they were debating the adoption of DST in 1908; but by 1916 this
term appears only in quotes taken from DST's opponents, whereas the
proponents (who eventually won the argument) are quoted as using ``Summer''.

From Arthur David Olson (1989-01-19):

A source at the British Information Office in New York avers that it's
known as "British" Summer Time in all parts of the United Kingdom.

Date: 4 Jan 89 08:57:25 GMT (Wed)
From: Jonathan Leffler
[British Summer Time] is fixed annually by Act of Parliament.
If you can predict what Parliament
will do, you should be in
politics making a fortune, not computing.

From Chris Carrier (1996-06-14):
I remember reading in various wartime issues of the London Times the
acronym BDST for British Double Summer Time. Look for the published
time of sunrise and sunset in The Times, when BDST was in effect, and
if you find a zone reference it will say, "All times B.D.S.T."

From Joseph S. Myers (1999-09-02):
... some military cables (WO 219/4100 - this is a copy from the
main SHAEF archives held in the US National Archives, SHAEF/5252/8/516)

agree that the usage is BDST (this appears in a message dated 17 Feb 1945).

From Joseph S. Myers (2000-10-03):

On 18th April 1941, Sir Stephen Tallents of the BBC wrote to Sir
Alexander Maxwell of the Home Office asking whether there was any
official designation; the reply of the 21st was that there wasn't
but he couldn't think of anything better than the "Double British
Summer Time" that the BBC had been using informally.

#

<http://student.cusu.cam.ac.uk/~jsm28/british-time/bbc-19410418.png>

<http://student.cusu.cam.ac.uk/~jsm28/british-time/ho-19410421.png>

From Sir Alexander Maxwell in the above-mentioned letter (1941-04-21):

[N]o official designation has as far as I know been adopted for the time
which is to be introduced in May....

I cannot think of anything better than "Double British Summer Time"
which could not be said to run counter to any official description.

From Paul Eggert (2000-10-02):

Howse writes (p 157) `DBST' too, but `BDST' seems to have been common
and follows the more usual convention of putting the location name first,
so we use `BDST'.

Peter Ilieve (1998-04-19) described at length

the history of summer time legislation in the United Kingdom.

Since 1998 Joseph S. Myers has been updating

and extending this list, which can be found in

<http://student.cusu.cam.ac.uk/~jsm28/british-time/>

[](http://www.polyomino.org.uk/british-time/)

History

of legal time in Britain

[](#)

Rob Crowther (2012-01-04) reports that that URL no longer

exists, and the article can now be found at:

[](http://www.polyomino.org.uk/british-time/)

<http://www.polyomino.org.uk/british-time/>

[](#)

From Joseph S. Myers (1998-01-06):

#

The legal time in the UK outside of summer time is definitely GMT, not UTC;

see Lord Tanlaw's speech

#

(Lords Hansard 11 June 1997 columns 964 to 976)

[](#).

From Paul Eggert (2006-03-22):

For lack of other data, follow Shanks & Pottenger for Eire in 1940-1948.

Given Ilieve and Myers's data, the following claims by Shanks & Pottenger
are incorrect:
* Wales did not switch from GMT to daylight saving time until
1921 Apr 3, when they began to conform with the rest of Great Britain.
Actually, Wales was identical after 1880.
* Eire had two transitions
on 1916 Oct 1.
It actually just had one transition.
* Northern Ireland used single daylight saving time throughout WW II.
Actually, it conformed to Britain.
* GB-Eire changed standard time to 1 hour ahead of GMT on 1968-02-18.
Actually, that date saw the usual switch to summer time.
Standard time was not changed until 1968-10-27 (the clocks didn't change).

Here is another incorrect claim by Shanks & Pottenger:
* Jersey, Guernsey, and the Isle of Man did not switch from GMT
to daylight saving time until 1921 Apr 3, when they began to
conform with Great Britain.
S.R.&O. 1916, No. 382 and HO 45/10811/312364 (quoted above) say otherwise.

The following claim by Shanks & Pottenger is possible though doubtful;
we'll ignore it for now.
* Dublin's 1971-10-31 switch was at 02:00, even though London's was 03:00.

Whitman says Dublin Mean Time was -0:25:21, which is more precise than
Shanks & Pottenger.
Perhaps this was Dunsink Observatory
Time, as Dunsink Observatory
(8 km NW of Dublin's center) seemingly was to Dublin as Greenwich was
to London. For example:

"Timeball on the ballast office is down. Dunsink time."
-- James Joyce, Ulysses

From Joseph S. Myers (2005-01-26):
Irish laws are available online at www.irishstatutebook.ie. These include
various relating to legal time, for example:

[ZZA13Y1923.html](#) [ZZA12Y1924.html](#) [ZZA8Y1925.html](#) [ZZSIV20PG1267.html](#)

[ZZSI71Y1947.html](#) [ZZSI128Y1948.html](#) [ZZSI23Y1949.html](#) [ZZSI41Y1950.html](#)
[ZZSI27Y1951.html](#) [ZZSI73Y1952.html](#)

[ZZSI11Y1961.html](#) [ZZSI232Y1961.html](#) [ZZSI182Y1962.html](#)

ZZSI167Y1963.html ZZSI257Y1964.html ZZSI198Y1967.html
ZZA23Y1968.html ZZA17Y1971.html

ZZSI67Y1981.html ZZSI212Y1982.html ZZSI45Y1986.html
ZZSI264Y1988.html ZZSI52Y1990.html ZZSI371Y1992.html
ZZSI395Y1994.html ZZSI484Y1997.html ZZSI506Y2001.html

[These are all relative to the root, e.g., the first is
<<http://www.irishstatutebook.ie/ZZA13Y1923.html>>.]

(These are
those I found, but there could be more. In any case these
should allow various updates to the comments in the europe file to cover
the laws applicable in Ireland.)

(Note that the time in the Republic of Ireland since 1968 has been defined
in terms of standard time being GMT+1 with a period of winter time when it
is GMT, rather than standard time being GMT with a period of summer time
being GMT+1.)

From Paul Eggert (1999-03-28):
Clive Feather (<news:859845706.26043.0@office.demon.net>, 1997-03-31)
reports that Folkestone (Cheriton) Shuttle Terminal uses Concession Time
(CT), equivalent to French civil time.
Julian Hill (<news:36118128.5A14@virgin.net>, 1998-09-30) reports that
trains between Dollands Moor (the freight facility next door)
and Frethun run in CT.
My admittedly uninformed guess is that the terminal has two authorities,
the French concession operators and the British civil authorities,
and that the time depends on who you're talking to.

If, say, the British police were called to the station for some reason,
I would expect the official police report to use GMT/BST and not CET/CEST.
This is a borderline case, but for now let's stick to GMT/BST.

From an anonymous contributor (1996-06-02):
The law governing time in Ireland is under Statutory Instrument SI 395/94,
which gives force to European Union 7th Council Directive # 94/21/EC.
Under this directive, the Minister for Justice in Ireland makes appropriate
regulations. I spoke this morning with the Secretary of the Department of
Justice (tel +353 1 678 9711) who confirmed to me that the correct name is
"Irish Summer Time", abbreviated to "IST".

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Summer Time Act, 1916
Rule GB-Eire 1916 only - May 21 2:00s 1:00 BST
Rule GB-Eire 1916 only - Oct 1 2:00s 0 GMT
S.R.&O. 1917, No. 358

Rule GB-Eire 1917 only - Apr 8 2:00s 1:00 BST
Rule GB-Eire 1917 only - Sep 17 2:00s 0 GMT
S.R.&O. 1918, No. 274
Rule GB-Eire 1918 only - Mar 24 2:00s 1:00 BST
Rule GB-Eire 1918 only - Sep 30 2:00s 0 GMT

S.R.&O. 1919, No. 297
Rule GB-Eire 1919 only - Mar 30 2:00s 1:00 BST
Rule GB-Eire 1919 only - Sep 29 2:00s 0 GMT
S.R.&O. 1920, No. 458
Rule GB-Eire 1920 only - Mar 28 2:00s 1:00 BST
S.R.&O. 1920, No. 1844
Rule GB-Eire 1920 only - Oct 25 2:00s 0 GMT
S.R.&O. 1921, No. 363
Rule GB-Eire 1921 only - Apr 3 2:00s 1:00 BST
Rule GB-Eire 1921 only - Oct 3 2:00s 0 GMT
S.R.&O. 1922, No. 264
Rule GB-Eire 1922 only - Mar 26 2:00s 1:00 BST
Rule GB-Eire 1922 only - Oct 8 2:00s 0 GMT
The Summer Time Act, 1922
Rule GB-Eire 1923 only - Apr Sun>=16 2:00s 1:00 BST
Rule GB-Eire 1923 1924 - Sep Sun>=16 2:00s 0 GMT
Rule GB-Eire 1924 only - Apr Sun>=9 2:00s 1:00 BST
Rule GB-Eire 1925 1926 - Apr Sun>=16 2:00s 1:00 BST
The Summer Time Act, 1925
Rule GB-Eire 1925 1938 - Oct Sun>=2 2:00s 0 GMT
Rule GB-Eire 1927 only - Apr Sun>=9 2:00s 1:00 BST
Rule GB-Eire 1928 1929 - Apr Sun>=16 2:00s 1:00 BST
Rule GB-Eire 1930 only - Apr Sun>=9 2:00s 1:00 BST
Rule GB-Eire 1931 1932 - Apr Sun>=16 2:00s 1:00 BST
Rule GB-Eire 1933 only - Apr Sun>=9 2:00s 1:00 BST
Rule GB-Eire 1934 only - Apr Sun>=16 2:00s 1:00 BST
Rule GB-Eire 1935 only - Apr Sun>=9 2:00s 1:00 BST
Rule GB-Eire 1936 1937 - Apr Sun>=16 2:00s 1:00 BST
Rule GB-Eire 1938 only - Apr Sun>=9 2:00s 1:00 BST
Rule GB-Eire 1939 only - Apr Sun>=16 2:00s 1:00 BST

S.R.&O. 1939, No. 1379
Rule GB-Eire 1939 only - Nov Sun>=16 2:00s 0 GMT
S.R.&O. 1940, No. 172 and No. 1883
Rule GB-Eire 1940 only - Feb Sun>=23 2:00s 1:00 BST
S.R.&O. 1941, No. 476
Rule GB-Eire 1941 only - May Sun>=2 1:00s 2:00 BDST
Rule GB-Eire 1941 1943 - Aug Sun>=9 1:00s 1:00 BST
S.R.&O. 1942, No. 506
Rule GB-Eire 1942 1944 - Apr Sun>=2 1:00s 2:00 BDST
S.R.&O. 1944, No. 932
Rule GB-Eire 1944 only - Sep Sun>=16 1:00s 1:00 BST

S.R.&O. 1945, No. 312
 Rule GB-Eire 1945 only - Apr Mon>=2 1:00s 2:00 BDST
 Rule GB-Eire 1945 only - Jul Sun>=9 1:00s 1:00 BST
 # S.R.&O. 1945, No. 1208
 Rule GB-Eire 1945 1946 - Oct Sun>=2 2:00s 0 GMT
 Rule GB-Eire 1946 only - Apr Sun>=9 2:00s 1:00 BST
 #
 The Summer Time Act, 1947
 Rule GB-Eire 1947 only - Mar 16 2:00s 1:00 BST
 Rule GB-Eire 1947 only - Apr 13 1:00s 2:00 BDST
 Rule GB-Eire 1947 only - Aug 10 1:00s 1:00 BST
 Rule GB-Eire 1947 only - Nov 2 2:00s 0 GMT
 # Summer Time Order, 1948 (S.I. 1948/495)
 Rule GB-Eire 1948 only - Mar 14 2:00s 1:00 BST
 Rule GB-Eire 1948 only - Oct 31 2:00s 0 GMT
 # Summer Time Order, 1949 (S.I. 1949/373)
 Rule GB-Eire 1949 only - Apr 3 2:00s 1:00 BST
 Rule GB-Eire 1949 only - Oct 30 2:00s 0 GMT
 # Summer Time Order, 1950 (S.I. 1950/518)
 # Summer Time Order, 1951 (S.I. 1951/430)
 # Summer Time Order, 1952 (S.I. 1952/451)
 Rule GB-Eire 1950 1952 - Apr Sun>=14 2:00s 1:00 BST
 Rule GB-Eire 1950 1952 - Oct Sun>=21 2:00s 0 GMT
 # revert to the rules of the Summer Time Act, 1925
 Rule GB-Eire 1953 only - Apr Sun>=16 2:00s 1:00 BST
 Rule GB-Eire 1953 1960 - Oct Sun>=2 2:00s 0 GMT
 Rule GB-Eire 1954 only - Apr Sun>=9 2:00s 1:00 BST
 Rule GB-Eire 1955 1956 - Apr Sun>=16 2:00s 1:00 BST
 Rule GB-Eire 1957 only - Apr Sun>=9 2:00s 1:00 BST
 Rule GB-Eire 1958 1959 - Apr Sun>=16 2:00s 1:00 BST
 Rule GB-Eire 1960 only - Apr Sun>=9 2:00s 1:00 BST
 #
 Summer Time Order, 1961 (S.I. 1961/71)
 # Summer Time (1962) Order, 1961 (S.I. 1961/2465)
 # Summer Time Order, 1963 (S.I. 1963/81)
 Rule GB-Eire 1961 1963 - Mar lastSun 2:00s 1:00 BST
 Rule GB-Eire 1961 1968 - Oct Sun>=23 2:00s 0 GMT
 # Summer Time (1964) Order, 1963 (S.I. 1963/2101)
 # Summer Time Order, 1964 (S.I. 1964/1201)
 # Summer Time Order, 1967 (S.I. 1967/1148)
 Rule GB-Eire 1964 1967 - Mar Sun>=19 2:00s 1:00 BST
 # Summer Time Order, 1968 (S.I. 1968/117)
 Rule GB-Eire 1968 only - Feb 18 2:00s 1:00 BST
 # The British Standard Time Act, 1968
 # (no summer time)
 # The Summer Time Act, 1972
 Rule GB-Eire 1972 1980 - Mar Sun>=16 2:00s 1:00 BST
 Rule GB-Eire 1972 1980 - Oct Sun>=23 2:00s 0 GMT


```
# Summer Time Order, 1980 (S.I. 1980/1089)
# Summer Time Order, 1982 (S.I. 1982/1673)
# Summer Time Order,
  1986 (S.I. 1986/223)
# Summer Time Order, 1988 (S.I. 1988/931)
Rule GB-Eire 1981 1995 - Mar lastSun 1:00u 1:00 BST
Rule GB-Eire 1981 1989 - Oct Sun>=23 1:00u 0 GMT
# Summer Time Order, 1989 (S.I. 1989/985)
# Summer Time Order, 1992 (S.I. 1992/1729)
# Summer Time Order 1994 (S.I. 1994/2798)
Rule GB-Eire 1990 1995 - Oct Sun>=22 1:00u 0 GMT
# Summer Time Order 1997 (S.I. 1997/2982)
# See EU for rules starting in 1996.
```

```
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/London -0:01:15 - LMT 1847 Dec 1 0:00s
  0:00 GB-Eire %s 1968 Oct 27
  1:00 - BST 1971 Oct 31 2:00u
  0:00 GB-Eire %s 1996
  0:00 EU GMT/BST
Link Europe/London Europe/Jersey
Link Europe/London Europe/Guernsey
Link Europe/London Europe/Isle_of_Man
Zone Europe/Dublin -0:25:00 - LMT 1880 Aug 2
  -0:25:21 - DMT 1916 May 21 2:00
  -0:25:21 1:00 IST 1916 Oct 1 2:00s
  0:00 GB-Eire %s 1921 Dec 6 # independence
  0:00 GB-Eire GMT/IST 1940 Feb 25 2:00
  0:00 1:00 IST 1946 Oct 6 2:00
  0:00 - GMT 1947 Mar 16
2:00
  0:00 1:00 IST 1947 Nov 2 2:00
  0:00 - GMT 1948 Apr 18 2:00
  0:00 GB-Eire GMT/IST 1968 Oct 27
  1:00 - IST 1971 Oct 31 2:00u
  0:00 GB-Eire GMT/IST 1996
  0:00 EU GMT/IST
```

```
#####
```

```
# Europe
```

```
# EU rules are for the European Union, previously known as the EC, EEC,
# Common Market, etc.
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
```

```
Rule EU 1977 1980 - Apr Sun>=1 1:00u 1:00 S
```

```
Rule EU 1977 only - Sep lastSun 1:00u 0 -
```

Rule EU 1978 only - Oct 1 1:00u 0 -
Rule EU 1979 1995 - Sep lastSun 1:00u 0 -
Rule EU 1981 max - Mar lastSun 1:00u 1:00 S
Rule EU 1996 max - Oct lastSun 1:00u 0 -
The most recent directive covers the years starting in 2002. See:
<a="http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=CELEX:32000L0084:EN:NOT">
Directive 2000/84/EC of the European Parliament and of the Council
of 19 January 2001 on summer-time arrangements.

W-Eur differs from EU only in that
W-Eur uses standard time.
Rule W-Eur 1977 1980 - Apr Sun>=1 1:00s 1:00 S
Rule W-Eur 1977 only - Sep lastSun 1:00s 0 -
Rule W-Eur 1978 only - Oct 1 1:00s 0 -
Rule W-Eur 1979 1995 - Sep lastSun 1:00s 0 -
Rule W-Eur 1981 max - Mar lastSun 1:00s 1:00 S
Rule W-Eur 1996 max - Oct lastSun 1:00s 0 -

Older C-Eur rules are for convenience in the tables.
From 1977 on, C-Eur differs from EU only in that C-Eur uses standard time.

Rule C-Eur 1916 only - Apr 30 23:00 1:00 S
Rule C-Eur 1916 only - Oct 1 1:00 0 -
Rule C-Eur 1917 1918 - Apr Mon>=15 2:00s 1:00 S
Rule C-Eur 1917 1918 - Sep Mon>=15 2:00s 0 -
Rule C-Eur 1940 only - Apr 1 2:00s 1:00 S
Rule C-Eur 1942 only - Nov 2 2:00s 0 -
Rule C-Eur 1943 only - Mar 29 2:00s 1:00 S
Rule C-Eur 1943 only - Oct 4 2:00s 0 -
Rule C-Eur 1944 1945 - Apr Mon>=1 2:00s 1:00 S
Whitman gives 1944 Oct 7; go with Shanks & Pottenger.
Rule C-Eur 1944 only - Oct 2 2:00s 0 -
From Jesper Norgaard Welen (2008-07-13):

I found what is probably
a typo of 2:00 which should perhaps be 2:00s
in the C-Eur rule from tz database version 2008d (this part was
corrected in version 2008d). The circumstantial evidence is simply the
tz database itself, as seen below:

Zone Europe/Paris 0:09:21 - LMT 1891 Mar 15 0:01
0:00 France WE%sT 1945 Sep 16 3:00

Zone Europe/Monaco 0:29:32 - LMT 1891 Mar 15
0:00 France WE%sT 1945 Sep 16 3:00

Zone Europe/Belgrade 1:22:00 - LMT 1884
1:00 1:00 CEST 1945 Sep 16 2:00s

```

#
# Rule France 1945 only - Sep 16 3:00 0 -
# Rule Belgium 1945 only - Sep 16 2:00s 0 -
# Rule Neth 1945 only - Sep 16 2:00s 0 -
#
# The rule line to be changed is:
#
# Rule C-Eur 1945 only - Sep 16 2:00 0 -
#
# It seems that Paris, Monaco, Rule France, Rule Belgium all agree on
# 2:00 standard time, e.g. 3:00 local time. However there are no
# countries that use C-Eur rules in September 1945, so the only items
# affected are apparently these fictitious zones that translates acronyms
# CET and MET:
#
#
Zone CET 1:00 C-Eur CE%sT
# Zone MET 1:00 C-Eur ME%sT
#
# It this is right then the corrected version would look like:
#
# Rule C-Eur 1945 only - Sep 16 2:00s 0 -
#
# A small step for mankind though 8-)
Rule C-Eur 1945 only - Sep 16 2:00s 0 -
Rule C-Eur 1977 1980 - Apr Sun>=1 2:00s 1:00 S
Rule C-Eur 1977 only - Sep lastSun 2:00s 0 -
Rule C-Eur 1978 only - Oct 1 2:00s 0 -
Rule C-Eur 1979 1995 - Sep lastSun 2:00s 0 -
Rule C-Eur 1981 max - Mar lastSun 2:00s 1:00 S
Rule C-Eur 1996 max - Oct lastSun 2:00s 0 -

# E-Eur differs from EU only in that E-Eur switches at midnight local time.
Rule E-Eur 1977 1980 - Apr Sun>=1 0:00 1:00 S
Rule E-Eur 1977 only - Sep lastSun 0:00 0 -
Rule E-Eur 1978 only - Oct 1 0:00 0 -
Rule E-Eur 1979 1995 - Sep lastSun 0:00 0 -
Rule E-Eur 1981 max - Mar lastSun 0:00 1:00 S
Rule E-Eur 1996 max - Oct lastSun 0:00 0 -

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Russia 1917 only - Jul 1 23:00 1:00 MST # Moscow Summer Time
Rule Russia 1917 only - Dec 28
0:00 0 MMT # Moscow Mean Time
Rule Russia 1918 only - May 31 22:00 2:00 MDST # Moscow Double Summer Time
Rule Russia 1918 only - Sep 16 1:00 1:00 MST
Rule Russia 1919 only - May 31 23:00 2:00 MDST
Rule Russia 1919 only - Jul 1 2:00 1:00 S

```

Rule Russia 1919 only - Aug 16 0:00 0 -
Rule Russia 1921 only - Feb 14 23:00 1:00 S
Rule Russia 1921 only - Mar 20 23:00 2:00 M # Midsummer
Rule Russia 1921 only - Sep 1 0:00 1:00 S
Rule Russia 1921 only - Oct 1 0:00 0 -
Act No.925 of the Council of Ministers of the USSR (1980-10-24):
Rule Russia 1981 1984 - Apr 1 0:00 1:00 S
Rule Russia 1981 1983 - Oct 1 0:00 0 -
Act No.967 of the Council of Ministers of the USSR (1984-09-13), repeated in
Act No.227 of the Council of Ministers of the USSR (1989-03-14):
Rule Russia 1984 1991 - Sep lastSun 2:00s 0 -
Rule Russia 1985 1991 - Mar lastSun 2:00s 1:00 S

Rule Russia 1992 only - Mar lastSat 23:00 1:00 S
Rule Russia 1992 only - Sep lastSat 23:00 0 -
Rule Russia 1993 2010 - Mar lastSun
2:00s 1:00 S
Rule Russia 1993 1995 - Sep lastSun 2:00s 0 -
Rule Russia 1996 2010 - Oct lastSun 2:00s 0 -

From Alexander Krivenyshev (2011-06-14):
According to Kremlin press service, Russian President Dmitry Medvedev
signed a federal law "On calculation of time" on June 9, 2011.
According to the law Russia is abolishing daylight saving time.

Medvedev signed a law "On the Calculation of Time" (in russian):

http://bmockbe.ru/events/?ID=7583

Medvedev signed a law on the calculation of the time (in russian):

http://www.regnum.ru/news/polit/1413906.html

From Arthur David Olson (2011-06-15):
Take "abolishing daylight saving time" to mean that time is now considered
to be standard.

These are for backward compatibility with older versions.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone WET 0:00 EU WE%sT

Zone CET 1:00 C-Eur CE%sT

Zone MET 1:00 C-Eur ME%sT

Zone EET 2:00 EU EE%sT

#

Previous editions of this database used abbreviations like MET DST
for Central European Summer Time, but this didn't agree with common usage.

From Markus Kuhn (1996-07-12):
The official German names ... are

Mitteleuropaeische Zeit (MEZ) = UTC+01:00
Mitteleuropaeische Sommerzeit (MESZ) = UTC+02:00

as defined in the German Time Act (Gesetz ueber die Zeitbestimmung (ZeitG),
1978-07-25, Bundesgesetzblatt, Jahrgang 1978, Teil I, S. 1110-1111)....
I wrote ... to the German Federal Physical-Technical Institution

Physikalisch-Technische Bundesanstalt (PTB)
Laboratorium 4.41 "Zeiteinheit"
Postfach 3345
D-38023 Braunschweig
phone: +49 531 592-0

... I received today an answer letter from Dr. Peter Hetzel, head of the PTB
department for time and frequency transmission. He explained that the
PTB translates MEZ and MESZ into English as

Central European Time (CET) = UTC+01:00
Central
European Summer Time (CEST) = UTC+02:00

Albania
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Albania 1940 only - Jun 16 0:00 1:00 S
Rule Albania 1942 only - Nov 2 3:00 0 -
Rule Albania 1943 only - Mar 29 2:00 1:00 S
Rule Albania 1943 only - Apr 10 3:00 0 -
Rule Albania 1974 only - May 4 0:00 1:00 S
Rule Albania 1974 only - Oct 2 0:00 0 -
Rule Albania 1975 only - May 1 0:00 1:00 S
Rule Albania 1975 only - Oct 2 0:00 0 -
Rule Albania 1976 only - May 2 0:00 1:00 S
Rule Albania 1976 only - Oct 3 0:00 0 -
Rule Albania 1977 only - May 8 0:00 1:00 S
Rule Albania 1977 only - Oct 2 0:00 0 -
Rule Albania 1978 only - May 6 0:00 1:00 S
Rule Albania 1978 only - Oct 1 0:00 0 -
Rule Albania 1979 only - May 5 0:00 1:00 S
Rule Albania 1979 only - Sep 30 0:00 0 -
Rule Albania 1980 only - May 3 0:00 1:00 S
Rule Albania 1980 only - Oct 4 0:00 0 -

Rule Albania 1981 only - Apr 26 0:00 1:00 S
 Rule Albania 1981 only - Sep 27 0:00 0 -
 Rule Albania 1982 only - May 2 0:00 1:00 S
 Rule Albania 1982 only - Oct
 3 0:00 0 -
 Rule Albania 1983 only - Apr 18 0:00 1:00 S
 Rule Albania 1983 only - Oct 1 0:00 0 -
 Rule Albania 1984 only - Apr 1 0:00 1:00 S
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Europe/Tirane 1:19:20 - LMT 1914
 1:00 - CET 1940 Jun 16
 1:00 Albania CE%sT 1984 Jul
 1:00 EU CE%sT

Andorra
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Europe/Andorra 0:06:04 - LMT 1901
 0:00 - WET 1946 Sep 30
 1:00 - CET 1985 Mar 31 2:00
 1:00 EU CE%sT

Austria

Milne says Vienna time was 1:05:21.

From Paul Eggert (2006-03-22): Shanks & Pottenger give 1918-06-16 and
 # 1945-11-18, but the Austrian Federal Office of Metrology and
 # Surveying (BEV) gives 1918-09-16 and for Vienna gives the "alleged"
 # date of 1945-04-12 with no time. For the 1980-04-06 transition
 # Shanks & Pottenger give 02:00, the BEV 00:00. Go with the BEV,
 # and guess 02:00 for 1945-04-12.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
 Rule Austria 1920 only - Apr 5 2:00s 1:00 S
 Rule Austria 1920 only - Sep 13 2:00s 0 -
 Rule Austria 1946 only - Apr 14 2:00s 1:00 S
 Rule Austria 1946 1948 - Oct Sun>=1 2:00s 0 -
 Rule Austria 1947 only - Apr
 6 2:00s 1:00 S
 Rule Austria 1948 only - Apr 18 2:00s 1:00 S
 Rule Austria 1980 only - Apr 6 0:00 1:00 S
 Rule Austria 1980 only - Sep 28 0:00 0 -
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Europe/Vienna 1:05:21 - LMT 1893 Apr
 1:00 C-Eur CE%sT 1920
 1:00 Austria CE%sT 1940 Apr 1 2:00s
 1:00 C-Eur CE%sT 1945 Apr 2 2:00s
 1:00 1:00 CEST 1945 Apr 12 2:00s

1:00 - CET 1946
1:00 Austria CE%ST 1981
1:00 EU CE%ST

Belarus

From Yauhen Kharuzhy (2011-09-16):

By latest Belarus government act Europe/Minsk timezone was changed to

GMT+3 without DST (was GMT+2 with DST).

#

Sources (Russian language):

1.

http://www.belta.by/ru/all_news/society/V-Belarusi-otmenjaetsja-perexod-na-sezonnoe-vremja_i_572952.html

#

2.

http://naviny.by/rubrics/society/2011/09/16/ic_articles_116_175144/

3.

http://news.tut.by/society/250578.html

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Europe/Minsk 1:50:16 - LMT 1880

1:50 - MMT 1924 May 2 # Minsk Mean Time

2:00 - EET 1930 Jun 21

3:00 - MSK 1941 Jun 28

1:00 C-Eur CE%ST 1944 Jul 3

3:00 Russia MSK/MSD 1990

3:00 - MSK 1991 Mar 31 2:00s

2:00 1:00 EEST 1991 Sep 29 2:00s

2:00 - EET 1992 Mar 29 0:00s

2:00 1:00 EEST 1992 Sep 27 0:00s

2:00 Russia EE%ST 2011 Mar 27 2:00s

3:00 - FET # Further-eastern European Time

Belgium

#

From Paul Eggert (1997-07-02):

Entries from 1918 through 1991 are taken from:

Annuaire de L'Observatoire Royal de Belgique,

Avenue Circulaire, 3, B-1180 BRUXELLES, CLVIIe annee, 1991

(Imprimerie HAYEZ, s.p.r.l., Rue Fin, 4, 1080 BRUXELLES,

MCMXC),

pp 8-9.

LMT before 1892 was 0:17:30, according to the official journal of Belgium:

Moniteur Belge, Samedi 30 Avril 1892, N.121.
Thanks to Pascal Delmoitie for these references.
The 1918 rules are listed for completeness; they apply to unoccupied Belgium.
Assume Brussels switched to WET in 1918 when the armistice took effect.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Belgium 1918 only - Mar 9 0:00s 1:00 S
Rule Belgium 1918 1919 - Oct Sat>=1 23:00s 0 -
Rule Belgium 1919 only - Mar 1 23:00s 1:00 S
Rule Belgium 1920 only - Feb 14 23:00s 1:00 S
Rule Belgium 1920 only - Oct 23 23:00s 0 -
Rule Belgium 1921 only - Mar 14 23:00s 1:00 S
Rule Belgium 1921 only - Oct 25 23:00s 0 -
Rule Belgium 1922 only - Mar 25 23:00s 1:00 S
Rule Belgium 1922 1927 - Oct Sat>=1 23:00s 0 -
Rule Belgium 1923 only - Apr 21 23:00s 1:00 S
Rule Belgium 1924 only - Mar 29 23:00s 1:00 S
Rule Belgium 1925 only - Apr 4 23:00s 1:00 S
DSH writes that a royal decree of 1926-02-22
specified the Sun following 3rd
Sat in Apr (except if it's Easter, in which case it's one Sunday earlier),
to Sun following 1st Sat in Oct, and that a royal decree of 1928-09-15
changed the transition times to 02:00 GMT.
Rule Belgium 1926 only - Apr 17 23:00s 1:00 S
Rule Belgium 1927 only - Apr 9 23:00s 1:00 S
Rule Belgium 1928 only - Apr 14 23:00s 1:00 S
Rule Belgium 1928 1938 - Oct Sun>=2 2:00s 0 -
Rule Belgium 1929 only - Apr 21 2:00s 1:00 S
Rule Belgium 1930 only - Apr 13 2:00s 1:00 S
Rule Belgium 1931 only - Apr 19 2:00s 1:00 S
Rule Belgium 1932 only - Apr 3 2:00s 1:00 S
Rule Belgium 1933 only - Mar 26 2:00s 1:00 S
Rule Belgium 1934 only - Apr 8 2:00s 1:00 S
Rule Belgium 1935 only - Mar 31 2:00s 1:00 S
Rule Belgium 1936 only - Apr 19 2:00s 1:00 S
Rule Belgium 1937 only - Apr 4 2:00s 1:00 S
Rule Belgium 1938 only - Mar 27 2:00s 1:00 S
Rule Belgium 1939 only - Apr 16 2:00s 1:00 S
Rule Belgium 1939 only - Nov 19 2:00s 0 -
Rule Belgium 1940 only - Feb 25 2:00s 1:00 S
Rule Belgium 1944 only - Sep 17
2:00s 0 -
Rule Belgium 1945 only - Apr 2 2:00s 1:00 S
Rule Belgium 1945 only - Sep 16 2:00s 0 -
Rule Belgium 1946 only - May 19 2:00s 1:00 S
Rule Belgium 1946 only - Oct 7 2:00s 0 -
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Brussels 0:17:30 - LMT 1880

0:17:30 - BMT 1892 May 1 12:00 # Brussels MT
0:00 - WET 1914 Nov 8
1:00 - CET 1916 May 1 0:00
1:00 C-Eur CE%ST 1918 Nov 11 11:00u
0:00 Belgium WE%ST 1940 May 20 2:00s
1:00 C-Eur CE%ST 1944 Sep 3
1:00 Belgium CE%ST 1977
1:00 EU CE%ST

Bosnia and Herzegovina

see Serbia

Bulgaria

#

From Plamen Simenov via Steffen Thorsen (1999-09-09):

A document of Government of Bulgaria (No.94/1997) says:

EET --> EETDST is in 03:00 Local time in last Sunday of March ...

EETDST --> EET is in 04:00 Local time in last Sunday of October

#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Bulg 1979 only - Mar 31 23:00 1:00 S

Rule Bulg 1979 only - Oct 1 1:00 0 -

Rule Bulg 1980 1982 - Apr Sat>=1 23:00 1:00 S

Rule Bulg 1980 only - Sep 29

1:00 0 -

Rule Bulg 1981 only - Sep 27 2:00 0 -

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Europe/Sofia 1:33:16 - LMT 1880

1:56:56 - IMT 1894 Nov 30 # Istanbul MT?

2:00 - EET 1942 Nov 2 3:00

1:00 C-Eur CE%ST 1945

1:00 - CET 1945 Apr 2 3:00

2:00 - EET 1979 Mar 31 23:00

2:00 Bulg EE%ST 1982 Sep 26 2:00

2:00 C-Eur EE%ST 1991

2:00 E-Eur EE%ST 1997

2:00 EU EE%ST

Croatia

see Serbia

Cyprus

Please see the `asia' file for Asia/Nicosia.

Czech Republic

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Czech 1945 only - Apr 8 2:00s 1:00 S

Rule Czech 1945 only - Nov 18 2:00s 0 -

Rule Czech 1946 only - May 6 2:00s 1:00 S
 Rule Czech 1946 1949 - Oct Sun>=1 2:00s 0 -
 Rule Czech 1947 only - Apr 20 2:00s 1:00 S
 Rule Czech 1948 only - Apr 18 2:00s 1:00 S
 Rule Czech 1949 only - Apr 9 2:00s 1:00 S
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Europe/Prague 0:57:44 - LMT 1850
 0:57:44 - PMT 1891
 Oct # Prague Mean Time
 1:00 C-Eur CE%sT 1944 Sep 17 2:00s
 1:00 Czech CE%sT 1979
 1:00 EU CE%sT

Denmark, Faroe Islands, and Greenland

From Jesper Norgaard Welen (2005-04-26):
 # <http://www.hum.aau.dk/~poe/tid/tine/DanskTid.htm> says that the law
 # [introducing standard time] was in effect from 1894-01-01....
 # The page http://www.retsinfo.dk/_GETDOCI_/ACCN/A18930008330-REGL
 # confirms this, and states that the law was put forth 1893-03-29.
 #
 # The EU treaty with effect from 1973:
 # http://www.retsinfo.dk/_GETDOCI_/ACCN/A19722110030-REGL
 #
 # This provoked a new law from 1974 to make possible summer time changes
 # in subsequent decrees with the law
 # http://www.retsinfo.dk/_GETDOCI_/ACCN/A19740022330-REGL
 #
 # It seems however that no decree was set forward until 1980. I have
 # not found any decree, but in another related law, the effecting DST
 # changes are stated explicitly to be from 1980-04-06 at 02:00 to
 # 1980-09-28 at 02:00. If this is true, this
 # differs slightly from
 # the EU rule in that DST runs to 02:00, not 03:00. We don't know
 # when Denmark began using the EU rule correctly, but we have only
 # confirmation of the 1980-time, so I presume it was correct in 1981:
 # The law is about the management of the extra hour, concerning
 # working hours reported and effect on obligatory-rest rules (which
 # was suspended on that night):
 # http://www.retsinfo.dk/_GETDOCI_/ACCN/C19801120554-REGL

From Jesper Norgaard Welen (2005-06-11):
 # The Herning Folkeblad (1980-09-26) reported that the night between
 # Saturday and Sunday the clock is set back from three to two.

From Paul Eggert (2005-06-11):
 # Hence the "02:00" of the 1980 law refers to standard time, not
 # wall-clock time, and so the EU rules were in effect in 1980.

```

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Denmark 1916 only - May 14 23:00 1:00 S
Rule Denmark 1916 only - Sep 30 23:00 0 -
Rule Denmark 1940 only - May 15 0:00 1:00 S
Rule Denmark 1945 only - Apr
  2 2:00s 1:00 S
Rule Denmark 1945 only - Aug 15 2:00s 0 -
Rule Denmark 1946 only - May 1 2:00s 1:00 S
Rule Denmark 1946 only - Sep 1 2:00s 0 -
Rule Denmark 1947 only - May 4 2:00s 1:00 S
Rule Denmark 1947 only - Aug 10 2:00s 0 -
Rule Denmark 1948 only - May 9 2:00s 1:00 S
Rule Denmark 1948 only - Aug 8 2:00s 0 -
#
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Copenhagen 0:50:20 - LMT 1890
  0:50:20 - CMT 1894 Jan 1 # Copenhagen MT
  1:00 Denmark CE%sT 1942 Nov 2 2:00s
  1:00 C-Eur CE%sT 1945 Apr 2 2:00
  1:00 Denmark CE%sT 1980
  1:00 EU CE%sT
Zone Atlantic/Faroe -0:27:04 - LMT 1908 Jan 11 # Torshavn
  0:00 - WET 1981
  0:00 EU WE%sT
#
# From Paul Eggert (2004-10-31):
# During World War II, Germany maintained secret manned weather stations in
# East Greenland and Franz Josef Land, but we don't know their time zones.
# My source for this is Wilhelm Dege's book mentioned under Svalbard.
#
# From Paul Eggert (2006-03-22):
# Greenland joined the EU as
# part of Denmark, obtained home rule on 1979-05-01,
# and left the EU on 1985-02-01. It therefore should have been using EU
# rules at least through 1984. Shanks & Pottenger say Scoresbysund and Godthab
# used C-Eur rules after 1980, but IATA SSIM (1991/1996) says they use EU
# rules since at least 1991. Assume EU rules since 1980.

# From Gwillin Law (2001-06-06), citing
# <http://www.statkart.no/efs/efshefter/2001/efs5-2001.pdf> (2001-03-15),
# and with translations corrected by Steffen Thorsen:
#
# Greenland has four local times, and the relation to UTC
# is according to the following time line:
#
# The military zone near Thule UTC-4
# Standard Greenland time UTC-3

```

Scoresbysund UTC-1
Danmarkshavn UTC

In the military area near Thule and in Danmarkshavn DST will not be
introduced.

From Rives McDow (2001-11-01):

I correspond regularly with the Dansk Polarcenter, and wrote them at
the time to clarify the situation in Thule. Unfortunately, I have
not heard back
from them regarding my recent letter. [But I have
info from earlier correspondence.]

According to the center, a very small local time zone around Thule
Air Base keeps the time according to UTC-4, implementing daylight
savings using North America rules, changing the time at 02:00 local time....

The east coast of Greenland north of the community of Scoresbysund
uses UTC in the same way as in Iceland, year round, with no dst.
There are just a few stations on this coast, including the
Danmarkshavn ICAO weather station mentioned in your September 29th
email. The other stations are two sledge patrol stations in
Mestersvig and Daneborg, the air force base at Station Nord, and the
DPC research station at Zackenberg.

Scoresbysund and two small villages nearby keep time UTC-1 and use
the same daylight savings time period as in West Greenland (Godthab).

The rest of Greenland, including Godthab (this area, although it
includes central Greenland, is known as
west Greenland), keeps time
UTC-3, with daylight savings methods according to European rules.

It is common procedure to use UTC 0 in the wilderness of East and
North Greenland, because it is mainly Icelandic aircraft operators
maintaining traffic in these areas. However, the official status of
this area is that it sticks with Godthab time. This area might be
considered a dual time zone in some respects because of this.

From Rives McDow (2001-11-19):
I heard back from someone stationed at Thule; the time change took place
there at 2:00 AM.

From Paul Eggert (2006-03-22):
From 1997 on the CIA map shows Danmarkshavn on GMT;
the 1995 map as like Godthab.
For lack of better info, assume they were like Godthab before 1996.

```

# startkart.no says Thule does not observe DST, but this is clearly an error,
# so go with Shanks & Pottenger for Thule transitions until this year.
# For 2007 on assume Thule will stay in sync with US DST rules.
#
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Thule 1991 1992 - Mar lastSun 2:00 1:00 D
Rule Thule 1991 1992 - Sep lastSun 2:00 0 S
Rule Thule 1993 2006 - Apr Sun>=1 2:00 1:00 D
Rule Thule 1993 2006 - Oct lastSun 2:00 0 S
Rule Thule 2007 max - Mar Sun>=8 2:00 1:00 D
Rule Thule 2007 max - Nov Sun>=1 2:00 0 S
#
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone America/Danmarkshavn -1:14:40 - LMT 1916 Jul 28
-3:00 - WGT 1980 Apr 6 2:00
-3:00 EU WG%sT 1996
0:00 - GMT
Zone America/Scoresbysund -1:27:52 - LMT 1916 Jul 28 # Ittoqortoormiit
-2:00 - CGT 1980 Apr 6 2:00
-2:00 C-Eur CG%sT 1981 Mar 29
-1:00 EU EG%sT
Zone America/Godthab -3:26:56 - LMT 1916 Jul 28 # Nuuk
-3:00 - WGT 1980 Apr 6 2:00
-3:00 EU WG%sT
Zone America/Thule -4:35:08 - LMT 1916 Jul 28 # Pituffik air base
-4:00 Thule A%sT

# Estonia
# From Peter Ilieve (1994-10-15):
# A relative in Tallinn confirms the accuracy of the data for 1989 onwards
# [through 1994] and gives the legal authority for it,
# a regulation of the Government
# of Estonia, No. 111 of 1989....
#
# From Peter Ilieve (1996-10-28):
# [IATA SSIM (1992/1996) claims that the Baltic republics switch at 01:00s,
# but a relative confirms that Estonia still switches at 02:00s, writing:]
# ``I do not [know] exactly but there are some little different
# (confusing) rules for International Air and Railway Transport Schedules
# conversion in Sunday connected with end of summer time in Estonia....
# A discussion is running about the summer time efficiency and effect on
# human physiology. It seems that Estonia maybe will not change to
# summer time next spring."

# From Peter Ilieve (1998-11-04), heavily edited:
# <a href="http://trip.rk.ee/cgi-bin/thw?${BASE}=akt&${OOHTML}=rtd&TA=1998&TO=1&AN=1390">
# The 1998-09-22 Estonian time law

```

```

# </a>
# refers to the Eighth Directive and cites the association agreement between
# the EU and Estonia, ratified by the Estonian law (RT II 1995, 22--27, 120).
#
# I also asked [my relative] whether they use any standard
# abbreviation
# for their standard and summer times. He says no, they use "suveaeg"
# (summer time) and "talveaeg" (winter time).

# From <a href="http://www.baltictimes.com/">The Baltic Times</a> (1999-09-09)
# via Steffen Thorsen:
# This year will mark the last time Estonia shifts to summer time,
# a council of the ruling coalition announced Sept. 6...
# But what this could mean for Estonia's chances of joining the European
# Union are still unclear. In 1994, the EU declared summer time compulsory
# for all member states until 2001. Brussels has yet to decide what to do
# after that.

# From Mart Oruaas (2000-01-29):
# Regulation no. 301 (1999-10-12) obsoletes previous regulation
# no. 206 (1998-09-22) and thus sticks Estonia to +02:00 GMT for all
# the year round. The regulation is effective 1999-11-01.

# From Toomas Soome (2002-02-21):
# The Estonian government has changed once again timezone politics.
# Now we are using again EU rules.
#
# From Urmet Jaanes (2002-03-28):
#
# The legislative reference is Government decree No. 84 on 2002-02-21.

# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Tallinn 1:39:00 - LMT 1880
1:39:00 - TMT 1918 Feb # Tallinn Mean Time
1:00 C-Eur CE%sT 1919 Jul
1:39:00 - TMT 1921 May
2:00 - EET 1940 Aug 6
3:00 - MSK 1941 Sep 15
1:00 C-Eur CE%sT 1944 Sep 22
3:00 Russia MSK/MSD 1989 Mar 26 2:00s
2:00 1:00 EEST 1989 Sep 24 2:00s
2:00 C-Eur EE%sT 1998 Sep 22
2:00 EU EE%sT 1999 Nov 1
2:00 - EET 2002 Feb 21
2:00 EU EE%sT

# Finland

```

```

# From Hannu Strang (1994-09-25 06:03:37 UTC):
# Well, here in Helsinki we're just changing from summer time to regular one,
# and it's supposed to change at 4am...

# From Janne Snabb (2010-0715):
#
# I noticed that the Finland data is not accurate for years 1981 and 1982.
# During these two first trial years the DST adjustment was made one hour
# earlier than in forthcoming years. Starting 1983 the adjustment was made
# according to the central European standards.
#
#
# This is documented in Heikki Oja: Aikakirja 2007, published by The Almanac
# Office of University of Helsinki, ISBN 952-10-3221-9, available online (in
# Finnish) at
#
# <a href="http://almanakka.helsinki.fi/aikakirja/Aikakirja2007kokonaan.pdf">
# http://almanakka.helsinki.fi/aikakirja/Aikakirja2007kokonaan.pdf
# </a>
#
# Page 105 (56 in PDF version) has a handy table of all past daylight savings
# transitions. It is easy enough to interpret without Finnish skills.
#
# This is also confirmed by Finnish Broadcasting Company's archive at:
#
# <a href="http://www.yle.fi/elavaarkisto/?s=s&g=1&ag=5&t=&a=3401">
# http://www.yle.fi/elavaarkisto/?s=s&g=1&ag=5&t=&a=3401
# </a>
#
# The news clip from 1981 says that "the time between 2 and 3 o'clock does not
# exist tonight."

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Finland 1942 only - Apr 3 0:00 1:00 S
Rule Finland 1942 only - Oct 3 0:00 0 -
Rule Finland 1981 1982 - Mar lastSun 2:00 1:00 S
Rule Finland 1981 1982 - Sep lastSun 3:00 0 -
#
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Helsinki 1:39:52 - LMT 1878 May 31
1:39:52 - HMT 1921 May # Helsinki Mean Time
2:00 Finland EE%sT 1983
2:00 EU EE%sT

# Aaland Is
Link Europe/Helsinki Europe/Mariehamn

```

France

From *Ciro Discepolo* (2000-12-20):

#

Henri Le Corre, *Regimes Horaires pour le monde entier*, Editions

Traditionnelles - Paris 2 books, 1993

#

Gabriel, *Traite de l'heure dans le monde*, Guy Tredaniel editeur,

Paris, 1991

#

Francoise Gauquelin, *Problemes de l'heure resolu en astrologie*,

Guy tredaniel, Paris 1987

#

Shank & Pottenger seem to use `24:00' ambiguously; resolve it with *Whitman*.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule France 1916 only - Jun 14 23:00s 1:00 S

Rule France 1916 1919 - Oct Sun>=1 23:00s 0 -

Rule France 1917 only - Mar 24 23:00s 1:00 S

Rule France 1918 only - Mar 9 23:00s 1:00 S

Rule France 1919 only - Mar 1 23:00s 1:00 S

Rule France 1920 only - Feb 14 23:00s 1:00 S

Rule France 1920 only - Oct 23 23:00s 0 -

Rule France 1921 only - Mar 14 23:00s 1:00 S

Rule France 1921 only - Oct 25 23:00s 0 -

Rule France 1922 only - Mar 25 23:00s 1:00 S

#

DSH writes that a law of 1923-05-24 specified 3rd Sat in Apr at 23:00 to 1st

Sat in Oct at 24:00; and that in 1930, because of Easter, the transitions

were Apr 12 and Oct 5. Go with *Shanks & Pottenger*.

Rule France 1922 1938 - Oct Sat>=1 23:00s 0 -

Rule France 1923 only - May 26 23:00s 1:00 S

Rule France 1924 only - Mar 29 23:00s 1:00 S

Rule France 1925 only - Apr 4 23:00s 1:00 S

Rule France 1926 only - Apr 17 23:00s 1:00 S

Rule France 1927 only - Apr 9 23:00s 1:00 S

Rule France 1928 only - Apr 14 23:00s 1:00 S

Rule France 1929 only - Apr 20 23:00s 1:00 S

Rule France 1930 only - Apr 12 23:00s 1:00 S

Rule France 1931 only - Apr 18 23:00s 1:00 S

Rule France 1932 only - Apr 2 23:00s 1:00 S

Rule France 1933 only - Mar 25 23:00s 1:00 S

Rule France 1934 only - Apr 7 23:00s 1:00 S

Rule France 1935 only - Mar 30 23:00s 1:00 S

Rule France 1936 only - Apr 18 23:00s 1:00 S

Rule France 1937 only - Apr

3 23:00s 1:00 S

Rule France 1938 only - Mar 26 23:00s 1:00 S

Rule France 1939 only - Apr 15 23:00s 1:00 S

Rule France 1939 only - Nov 18 23:00s 0 -

Rule France 1940 only - Feb 25 2:00 1:00 S

The French rules for 1941-1944 were not used in Paris, but Shanks & Pottenger

write that they were used in Monaco and in many French locations.

Le Corre writes that the upper limit of the free zone was Arneguy, Orthez,

Mont-de-Marsan, Bazas, Langon, Lamotte-Montravel, Marouil, La

Rochefoucault, Champagne-Mouton, La Roche-Posay, La Haye-Descartes,

Loches, Montrichard, Vierzon, Bourges, Moulins, Digoin,

Paray-le-Monial, Montceau-les-Mines, Chalons-sur-Saone, Arbois,

Dole, Morez, St-Claude, and Collonges (Haute-Savoie).

Rule France 1941 only - May 5 0:00 2:00 M # Midsummer

Shanks & Pottenger say this transition occurred at Oct 6 1:00,

but go with Denis Excoffier (1997-12-12),

who quotes the Ephemerides Astronomiques

for 1998 from Bureau des Longitudes

as saying 5/10/41 22hUT.

Rule France 1941 only - Oct 6 0:00 1:00 S

Rule France 1942 only - Mar 9 0:00 2:00 M

Rule France 1942 only - Nov 2 3:00 1:00 S

Rule France 1943 only - Mar 29 2:00 2:00 M

Rule France 1943 only - Oct 4 3:00 1:00 S

Rule France 1944 only - Apr 3 2:00 2:00 M

Rule France 1944 only - Oct 8 1:00 1:00 S

Rule France 1945 only - Apr 2 2:00 2:00 M

Rule France 1945 only - Sep 16 3:00 0 -

Shanks & Pottenger give Mar 28 2:00 and Sep 26 3:00;

go with Excoffier's 28/3/76 0hUT and 25/9/76 23hUT.

Rule France 1976 only - Mar 28 1:00 1:00 S

Rule France 1976 only - Sep 26 1:00 0 -

Shanks & Pottenger give 0:09:20 for Paris Mean Time, and Whitman 0:09:05,

but Howse quotes the actual French legislation as saying 0:09:21.

Go with Howse. Howse writes that the time in France was officially based

on PMT-0:09:21 until 1978-08-09, when the time base finally switched to UTC.

Zone NAME GMT-OFF RULES FORMAT [UNTIL]

Zone Europe/Paris 0:09:21

- LMT 1891 Mar 15 0:01

0:09:21 - PMT 1911 Mar 11 0:01 # Paris MT

Shanks & Pottenger give 1940 Jun 14 0:00; go with Excoffier and Le Corre.

0:00 France WE%ST 1940 Jun 14 23:00

Le Corre says Paris stuck with occupied-France time after the liberation;

go with Shanks & Pottenger.

1:00 C-Eur CE%ST 1944 Aug 25

0:00 France WE%ST 1945 Sep 16 3:00

1:00 France CE%ST 1977

1:00 EU CE%ST

```

# Germany

# From Markus Kuhn (1998-09-29):
# The German time zone web site by the Physikalisch-Technische
# Bundesanstalt contains DST information back to 1916.
# [See tz-link.htm for the URL.]

# From Joerg Schilling (2002-10-23):
# In 1945, Berlin was switched to Moscow Summer time (GMT+4) by
# <a href="http://www.dhm.de/lemo/html/biografien/BersarinNikolai/">
# General [Nikolai] Bersarin</a>.

# From Paul Eggert (2003-03-08):
# <a href="http://www.parlament-berlin.de/pds-
fraktion.nsf/727459127c8b66ee8525662300459099/defc77cb784f180ac1256c2b0030274b/$FILE/bersarint.pdf">
#
# http://www.parlament-berlin.de/pds-
fraktion.nsf/727459127c8b66ee8525662300459099/defc77cb784f180ac1256c2b0030274b/$FILE/bersarint.pdf
# </a>
# says that Bersarin issued an order to use Moscow time on May 20.
# However, Moscow did not observe daylight saving in 1945, so
# this was equivalent to CEMT (GMT+3), not GMT+4.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Germany 1946 only - Apr 14 2:00s 1:00 S
Rule Germany 1946 only - Oct 7 2:00s 0 -
Rule Germany 1947 1949 - Oct Sun>=1 2:00s 0 -
# http://www.ptb.de/de/org/4/44/441/salt.htm says the following transition
# occurred at 3:00 MEZ, not the 2:00 MEZ given in Shanks & Pottenger.
# Go with the PTB.
Rule Germany 1947 only - Apr 6 3:00s 1:00 S
Rule Germany 1947 only - May 11 2:00s 2:00 M
Rule Germany 1947 only - Jun 29 3:00 1:00 S
Rule Germany 1948 only - Apr 18 2:00s 1:00 S
Rule Germany 1949 only - Apr 10 2:00s 1:00 S

Rule SovietZone 1945 only - May 24 2:00 2:00 M # Midsummer
Rule SovietZone 1945 only - Sep 24 3:00 1:00 S
Rule
SovietZone 1945 only - Nov 18 2:00s 0 -

# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Berlin 0:53:28 - LMT 1893 Apr
1:00 C-Eur CE%sT 1945 May 24 2:00
1:00 SovietZone CE%sT 1946
1:00 Germany CE%sT 1980

```

1:00 EU CE%ST

```
# From Tobias Conradi (2011-09-12):
# Busingen <http://www.buesingen.de>, surrounded by the Swiss canton
# Schaffhausen, did not start observing DST in 1980 as the rest of DE
# (West Germany at that time) and DD (East Germany at that time) did.
# DD merged into DE, the area is currently covered by code DE in ISO 3166-1,
# which in turn is covered by the zone Europe/Berlin.
#
# Source for the time in Busingen 1980:
# http://www.srf.ch/player/video?id=c012c029-03b7-4c2b-9164-aa5902cd58d3

# From Arthur David Olson (2012-03-03):
# Busingen and Zurich have shared clocks since 1970.
```

Link Europe/Zurich Europe/Busingen

```
# Georgia
# Please see the "asia" file for Asia/Tbilisi.
# Herodotus (Histories, IV.45) says Georgia north of the Phasis (now
# Rioni)
# is in Europe. Our reference location Tbilisi is in the Asian part.
```

```
# Gibraltar
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Gibraltar -0:21:24 - LMT 1880 Aug 2 0:00s
  0:00 GB-Eire %s 1957 Apr 14 2:00
  1:00 - CET 1982
  1:00 EU CE%ST
```

```
# Greece
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
# Whitman gives 1932 Jul 5 - Nov 1; go with Shanks & Pottenger.
Rule Greece 1932 only - Jul 7 0:00 1:00 S
Rule Greece 1932 only - Sep 1 0:00 0 -
# Whitman gives 1941 Apr 25 - ?; go with Shanks & Pottenger.
Rule Greece 1941 only - Apr 7 0:00 1:00 S
# Whitman gives 1942 Feb 2 - ?; go with Shanks & Pottenger.
Rule Greece 1942 only - Nov 2 3:00 0 -
Rule Greece 1943 only - Mar 30 0:00 1:00 S
Rule Greece 1943 only - Oct 4 0:00 0 -
# Whitman gives 1944 Oct 3 - Oct 31; go with Shanks & Pottenger.
Rule Greece 1944 only - Oct 3 0:00 1:00 S
Rule Greece 1944 only - Nov 2 0:00 0 -
Rule Greece 1975 only - Apr 12 0:00s 1:00 S
Rule Greece 1975 only - Nov 26 0:00s 0 -
Rule Greece 1976 only - Apr 11 2:00s 1:00 S
Rule Greece 1976 only - Oct 10 2:00s 0 -
```

Rule Greece 1977 1978 - Apr Sun>=1 2:00s 1:00 S
 Rule Greece 1977 only - Sep 26 2:00s 0 -
 Rule Greece 1978 only - Sep 24 4:00 0 -
 Rule Greece 1979 only - Apr
 1 9:00 1:00 S
 Rule Greece 1979 only - Sep 29 2:00 0 -
 Rule Greece 1980 only - Apr 1 0:00 1:00 S
 Rule Greece 1980 only - Sep 28 0:00 0 -
 # Zone NAME GMTTOFF RULES FORMAT [UNTIL]
 Zone Europe/Athens 1:34:52 - LMT 1895 Sep 14
 1:34:52 - AMT 1916 Jul 28 0:01 # Athens MT
 2:00 Greece EE%sT 1941 Apr 30
 1:00 Greece CE%sT 1944 Apr 4
 2:00 Greece EE%sT 1981
 # Shanks & Pottenger say it switched to C-Eur in 1981;
 # go with EU instead, since Greece joined it on Jan 1.
 2:00 EU EE%sT

Hungary
 # Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
 Rule Hungary 1918 only - Apr 1 3:00 1:00 S
 Rule Hungary 1918 only - Sep 29 3:00 0 -
 Rule Hungary 1919 only - Apr 15 3:00 1:00 S
 Rule Hungary 1919 only - Sep 15 3:00 0 -
 Rule Hungary 1920 only - Apr 5 3:00 1:00 S
 Rule Hungary 1920 only - Sep 30
 3:00 0 -
 Rule Hungary 1945 only - May 1 23:00 1:00 S
 Rule Hungary 1945 only - Nov 3 0:00 0 -
 Rule Hungary 1946 only - Mar 31 2:00s 1:00 S
 Rule Hungary 1946 1949 - Oct Sun>=1 2:00s 0 -
 Rule Hungary 1947 1949 - Apr Sun>=4 2:00s 1:00 S
 Rule Hungary 1950 only - Apr 17 2:00s 1:00 S
 Rule Hungary 1950 only - Oct 23 2:00s 0 -
 Rule Hungary 1954 1955 - May 23 0:00 1:00 S
 Rule Hungary 1954 1955 - Oct 3 0:00 0 -
 Rule Hungary 1956 only - Jun Sun>=1 0:00 1:00 S
 Rule Hungary 1956 only - Sep lastSun 0:00 0 -
 Rule Hungary 1957 only - Jun Sun>=1 1:00 1:00 S
 Rule Hungary 1957 only - Sep lastSun 3:00 0 -
 Rule Hungary 1980 only - Apr 6 1:00 1:00 S
 # Zone NAME GMTTOFF RULES FORMAT [UNTIL]
 Zone Europe/Budapest 1:16:20 - LMT 1890 Oct
 1:00 C-Eur CE%sT 1918
 1:00 Hungary CE%sT 1941 Apr 6 2:00
 1:00 C-Eur CE%sT 1945
 1:00 Hungary CE%sT 1980 Sep 28 2:00s
 1:00 EU CE%sT

Iceland

From Adam David (1993-11-06):
The name of the timezone in Iceland
for system / mail / news purposes is GMT.

(1993-12-05):
This material is paraphrased from the 1988 edition of the University of
Iceland Almanak.

From January 1st, 1908 the whole of Iceland was standardised at 1 hour
behind GMT. Previously, local mean solar time was used in different parts
of Iceland, the almanak had been based on Reykjavik mean solar time which
was 1 hour and 28 minutes behind GMT.

"first day of winter" referred to [below] means the first day of the 26 weeks
of winter, according to the old icelandic calendar that dates back to the
time the norsemen first settled Iceland. The first day of winter is always
Saturday, but is not dependent on the Julian or Gregorian calendars.

(1993-12-10):
I have a reference from the Oxford Icelandic-English dictionary for the
beginning of winter, which ties it to the ecclesiastical calendar (and thus
to the julian/gregorian calendar) over the period in question.
the winter begins on the Saturday
next before St. Luke's day
(old style), or on St. Luke's day, if a Saturday.
St. Luke's day ought to be traceable from ecclesiastical sources. "old style"
might be a reference to the Julian calendar as opposed to Gregorian, or it
might mean something else (???).

From Paul Eggert (2006-03-22):
The Iceland Almanak, Shanks & Pottenger, and Whitman disagree on many points.
We go with the Almanak, except for one claim from Shanks & Pottenger, namely
that Reykavik was 21W57 from 1837 to 1908, local mean time before that.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Iceland 1917 1918 - Feb 19 23:00 1:00 S
Rule Iceland 1917 only - Oct 21 1:00 0 -
Rule Iceland 1918 only - Nov 16 1:00 0 -
Rule Iceland 1939 only - Apr 29 23:00 1:00 S
Rule Iceland 1939 only - Nov 29 2:00 0 -
Rule Iceland 1940 only - Feb 25 2:00 1:00 S
Rule Iceland 1940 only - Nov 3 2:00 0 -
Rule Iceland 1941 only - Mar 2 1:00s 1:00 S
Rule Iceland 1941 only - Nov 2 1:00s 0 -
Rule Iceland 1942 only - Mar

```

8 1:00s 1:00 S
Rule Iceland 1942 only - Oct 25 1:00s 0 -
# 1943-1946 - first Sunday in March until first Sunday in winter
Rule Iceland 1943 1946 - Mar Sun>=1 1:00s 1:00 S
Rule Iceland 1943 1948 - Oct Sun>=22 1:00s 0 -
# 1947-1967 - first Sunday in April until first Sunday in winter
Rule Iceland 1947 1967 - Apr Sun>=1 1:00s 1:00 S
# 1949 Oct transition delayed by 1 week
Rule Iceland 1949 only - Oct 30 1:00s 0 -
Rule Iceland 1950 1966 - Oct Sun>=22 1:00s 0 -
Rule Iceland 1967 only - Oct 29 1:00s 0 -
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Atlantic/Reykjavik -1:27:24 - LMT 1837
-1:27:48 - RMT 1908 # Reykjavik Mean Time?
-1:00 Iceland IS%ST 1968 Apr 7 1:00s
0:00 - GMT

# Italy
#
# From Paul Eggert (2001-03-06):
# Sicily and Sardinia each had their own time zones from 1866 to 1893,
# called Palermo Time (+00:53:28) and Cagliari Time (+00:36:32).
# During World War II, German-controlled Italy used German time.
# But these events all occurred before the 1970
# cutoff,
# so record only the time in Rome.
#
# From Paul Eggert (2006-03-22):
# For Italian DST we have three sources: Shanks & Pottenger, Whitman, and
# F. Pollastri
# <a href="http://toi.iriti.cnr.it/uk/ienitlt.html">
# Day-light Saving Time in Italy (2006-02-03)
# </a>
# (^FP' below), taken from an Italian National Electrotechnical Institute
# publication. When the three sources disagree, guess who's right, as follows:
#
# year FP Shanks&P. (S) Whitman (W) Go with:
# 1916 06-03 06-03 24:00 06-03 00:00 FP & W
# 09-30 09-30 24:00 09-30 01:00 FP; guess 24:00s
# 1917 04-01 03-31 24:00 03-31 00:00 FP & S
# 09-30 09-29 24:00 09-30 01:00 FP & W
# 1918 03-09 03-09 24:00 03-09 00:00 FP & S
# 10-06 10-05 24:00 10-06 01:00 FP & W
# 1919 03-01 03-01 24:00 03-01 00:00 FP & S
# 10-04 10-04 24:00 10-04 01:00 FP; guess 24:00s
# 1920 03-20 03-20 24:00 03-20 00:00 FP & S
# 09-18 09-18 24:00 10-01 01:00 FP; guess 24:00s
# 1944 04-02 04-03 02:00 S (see C-Eur)

```

```

# 09-16 10-02 03:00 FP; guess 24:00s
#
1945 09-14 09-16 24:00 FP; guess 24:00s
# 1970 05-21 05-31 00:00 S
# 09-20 09-27 00:00 S
#
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Italy 1916 only - Jun 3 0:00s 1:00 S
Rule Italy 1916 only - Oct 1 0:00s 0 -
Rule Italy 1917 only - Apr 1 0:00s 1:00 S
Rule Italy 1917 only - Sep 30 0:00s 0 -
Rule Italy 1918 only - Mar 10 0:00s 1:00 S
Rule Italy 1918 1919 - Oct Sun>=1 0:00s 0 -
Rule Italy 1919 only - Mar 2 0:00s 1:00 S
Rule Italy 1920 only - Mar 21 0:00s 1:00 S
Rule Italy 1920 only - Sep 19 0:00s 0 -
Rule Italy 1940 only - Jun 15 0:00s 1:00 S
Rule Italy 1944 only - Sep 17 0:00s 0 -
Rule Italy 1945 only - Apr 2 2:00 1:00 S
Rule Italy 1945 only - Sep 15 0:00s 0 -
Rule Italy 1946 only - Mar 17 2:00s 1:00 S
Rule Italy 1946 only - Oct 6 2:00s 0 -
Rule Italy 1947 only - Mar 16 0:00s 1:00 S
Rule Italy 1947 only - Oct 5 0:00s 0 -
Rule Italy 1948 only - Feb 29 2:00s 1:00 S
Rule Italy 1948 only - Oct 3 2:00s 0 -
Rule Italy 1966 1968 - May Sun>=22 0:00 1:00 S
Rule Italy 1966 1969 - Sep Sun>=22 0:00 0 -
Rule Italy 1969 only - Jun
1 0:00 1:00 S
Rule Italy 1970 only - May 31 0:00 1:00 S
Rule Italy 1970 only - Sep lastSun 0:00 0 -
Rule Italy 1971 1972 - May Sun>=22 0:00 1:00 S
Rule Italy 1971 only - Sep lastSun 1:00 0 -
Rule Italy 1972 only - Oct 1 0:00 0 -
Rule Italy 1973 only - Jun 3 0:00 1:00 S
Rule Italy 1973 1974 - Sep lastSun 0:00 0 -
Rule Italy 1974 only - May 26 0:00 1:00 S
Rule Italy 1975 only - Jun 1 0:00s 1:00 S
Rule Italy 1975 1977 - Sep lastSun 0:00s 0 -
Rule Italy 1976 only - May 30 0:00s 1:00 S
Rule Italy 1977 1979 - May Sun>=22 0:00s 1:00 S
Rule Italy 1978 only - Oct 1 0:00s 0 -
Rule Italy 1979 only - Sep 30 0:00s 0 -
# Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Europe/Rome 0:49:56 - LMT 1866 Sep 22
0:49:56 - RMT 1893 Nov 1 0:00s # Rome Mean
1:00 Italy CE%sT 1942 Nov 2 2:00s

```

1:00 C-Eur CE%ST 1944 Jul

1:00 Italy CE%ST 1980

1:00 EU CE%ST

[Link Europe/Rome Europe/Vatican](#)

[Link Europe/Rome Europe/San_Marino](#)

Latvia

From

Liene Kanepe (1998-09-17):

I asked about this matter Scientific Secretary of the Institute of Astronomy
of The University of Latvia Dr. paed Mr. Ilgonis Vilks. I also searched the
correct data in juridical acts and I found some juridical documents about
changes in the counting of time in Latvia from 1981....

#

Act No.35 of the Council of Ministers of Latvian SSR of 1981-01-22 ...
according to the Act No.925 of the Council of Ministers of USSR of 1980-10-24
...: all year round the time of 2nd time zone + 1 hour, in addition turning
the hands of the clock 1 hour forward on 1 April at 00:00 (GMT 31 March 21:00)
and 1 hour backward on the 1 October at 00:00 (GMT 30 September 20:00).

#

Act No.592 of the Council of Ministers of Latvian SSR of 1984-09-24 ...
according to the Act No.967 of the Council of Ministers of USSR of 1984-09-13
...: all year round the time of 2nd time zone + 1 hour, in addition turning
the hands of the clock 1 hour forward on the last Sunday
of March at 02:00
(GMT 23:00 on the previous day) and 1 hour backward on the last Sunday of
September at 03:00 (GMT 23:00 on the previous day).

#

Act No.81 of the Council of Ministers of Latvian SSR of 1989-03-22 ...
according to the Act No.227 of the Council of Ministers of USSR of 1989-03-14
...: since the last Sunday of March 1989 in Lithuanian SSR, Latvian SSR,
Estonian SSR and Kaliningrad region of Russian Federation all year round the
time of 2nd time zone (Moscow time minus one hour). On the territory of Latvia
transition to summer time is performed on the last Sunday of March at 02:00
(GMT 00:00), turning the hands of the clock 1 hour forward. The end of
daylight saving time is performed on the last Sunday of September at 03:00
(GMT 00:00), turning the hands of the clock 1 hour backward. Exception is
1989-03-26, when we must not turn the hands of the clock....

#

The Regulations of the Cabinet of Ministers of the Republic of Latvia of
1997-01-21 on
transition to Summer time ... established the same order of
daylight savings time settings as in the States of the European Union.

From Andrei Ivanov (2000-03-06):

This year Latvia will not switch to Daylight Savings Time (as specified in

The Regulations of the Cabinet of Ministers of the Rep. of Latvia of
29-Feb-2000 (#79), in Latvian for subscribers only).

From RFE/RL Newsline (2001-01-03), noted after a heads-up by Rives McDow:

The Latvian government on 2 January decided that the country will
institute daylight-saving time this spring, LETA reported.
Last February the three Baltic states decided not to turn back their
clocks one hour in the spring....
Minister of Economy Aigars Kalvitis noted that Latvia had too few
daylight hours and thus decided to comply with a draft European
Commission directive that provides
for instituting daylight-saving
time in EU countries between 2002 and 2006. The Latvian government
urged Lithuania and Estonia to adopt a similar time policy, but it
appears that they will not do so....

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Latvia 1989 1996 - Mar lastSun 2:00s 1:00 S

Rule Latvia 1989 1996 - Sep lastSun 2:00s 0 -

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Europe/Riga 1:36:24 - LMT 1880

1:36:24 - RMT 1918 Apr 15 2:00 #Riga Mean Time

1:36:24 1:00 LST 1918 Sep 16 3:00 #Latvian Summer

1:36:24 - RMT 1919 Apr 1 2:00

1:36:24 1:00 LST 1919 May 22 3:00

1:36:24 - RMT 1926 May 11

2:00 - EET 1940 Aug 5

3:00 - MSK 1941 Jul

1:00 C-Eur CE%sT 1944 Oct 13

3:00 Russia MSK/MSD 1989 Mar lastSun 2:00s

2:00 1:00 EEST 1989 Sep lastSun 2:00s

2:00 Latvia EE%sT 1997 Jan 21

2:00 EU EE%sT 2000 Feb 29

2:00 - EET 2001 Jan 2

2:00 EU EE%sT

Liechtenstein

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Europe/Vaduz 0:38:04

- LMT 1894 Jun

1:00 - CET 1981

1:00 EU CE%sT

Lithuania

From Paul Eggert (1996-11-22):
IATA SSIM (1992/1996) says Lithuania uses W-Eur rules, but since it is
known to be wrong about Estonia and Latvia, assume it's wrong here too.

From Marius Gedminas (1998-08-07):
I would like to inform that in this year Lithuanian time zone
(Europe/Vilnius) was changed.

From [ELTA](http://www.elta.lt/) No. 972 (2582) (1999-09-29),
via Steffen Thorsen:
Lithuania has shifted back to the second time zone (GMT plus two hours)
to be valid here starting from October 31,
as decided by the national government on Wednesday....
The Lithuanian government also announced plans to consider a
motion to give up shifting to summer time in spring, as it was
already done by Estonia.

From the [Fact File](http://www.tourism.lt/informa/ff.htm), Lithuanian State Department of Tourism
(2000-03-27): Local time is GMT+2 hours ..., no daylight saving.

From
a user via Klaus Marten (2003-02-07):
As a candidate for membership of the European Union, Lithuania will
observe Summer Time in 2003, changing its clocks at the times laid
down in EU Directive 2000/84 of 19.I.01 (i.e. at the same times as its
neighbour Latvia). The text of the Lithuanian government Order of
7.XI.02 to this effect can be found at
<http://www.lrvk.lt/nut/11/n1749.htm>

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Vilnius 1:41:16 - LMT 1880
1:24:00 - WMT 1917 # Warsaw Mean Time
1:35:36 - KMT 1919 Oct 10 # Kaunas Mean Time
1:00 - CET 1920 Jul 12
2:00 - EET 1920 Oct 9
1:00 - CET 1940 Aug 3
3:00 - MSK 1941 Jun 24
1:00 C-Eur CE%sT 1944 Aug
3:00 Russia MSK/MSD 1991 Mar 31 2:00s
2:00 1:00 EEST 1991 Sep 29 2:00s
2:00 C-Eur EE%sT 1998
2:00 - EET 1998 Mar 29 1:00u
1:00 EU CE%sT 1999 Oct 31 1:00u
2:00 - EET 2003 Jan 1
2:00 EU EE%sT

Luxembourg
Whitman disagrees with most of these dates in minor ways;
go with
Shanks & Pottenger.
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Lux 1916 only - May 14 23:00 1:00 S
Rule Lux 1916 only - Oct 1 1:00 0 -
Rule Lux 1917 only - Apr 28 23:00 1:00 S
Rule Lux 1917 only - Sep 17 1:00 0 -
Rule Lux 1918 only - Apr Mon>=15 2:00s 1:00 S
Rule Lux 1918 only - Sep Mon>=15 2:00s 0 -
Rule Lux 1919 only - Mar 1 23:00 1:00 S
Rule Lux 1919 only - Oct 5 3:00 0 -
Rule Lux 1920 only - Feb 14 23:00 1:00 S
Rule Lux 1920 only - Oct 24 2:00 0 -
Rule Lux 1921 only - Mar 14 23:00 1:00 S
Rule Lux 1921 only - Oct 26 2:00 0 -
Rule Lux 1922 only - Mar 25 23:00 1:00 S
Rule Lux 1922 only - Oct Sun>=2 1:00 0 -
Rule Lux 1923 only - Apr 21 23:00 1:00 S
Rule Lux 1923 only - Oct Sun>=2 2:00 0 -
Rule Lux 1924 only - Mar 29 23:00 1:00 S
Rule Lux 1924 1928 - Oct Sun>=2 1:00 0 -
Rule Lux 1925 only - Apr 5 23:00 1:00 S
Rule Lux 1926 only - Apr 17 23:00 1:00 S
Rule Lux 1927 only - Apr 9 23:00 1:00 S
Rule Lux 1928 only - Apr 14 23:00 1:00 S
Rule Lux 1929 only - Apr 20 23:00 1:00 S

Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Europe/Luxembourg 0:24:36 - LMT 1904 Jun
1:00 Lux CE%sT 1918 Nov 25
0:00 Lux WE%sT 1929 Oct 6 2:00s
0:00 Belgium WE%sT 1940 May 14 3:00
1:00 C-Eur WE%sT 1944 Sep 18 3:00
1:00 Belgium CE%sT 1977
1:00 EU CE%sT

Macedonia
see Serbia

Malta
Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Malta 1973 only - Mar 31 0:00s 1:00 S
Rule Malta 1973 only - Sep 29 0:00s 0 -
Rule Malta 1974 only - Apr 21 0:00s 1:00 S
Rule Malta 1974 only - Sep 16 0:00s 0 -

Rule Malta 1975 1979 - Apr Sun>=15 2:00 1:00 S
Rule Malta 1975 1980 - Sep Sun>=15 2:00 0 -
Rule Malta 1980 only - Mar 31 2:00 1:00 S
Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Malta 0:58:04 - LMT 1893 Nov 2 0:00s # Valletta
1:00 Italy CE%sT 1942 Nov 2 2:00s
1:00 C-Eur CE%sT 1945 Apr 2 2:00s
1:00 Italy CE%sT 1973 Mar 31
1:00 Malta CE%sT 1981
1:00 EU CE%sT

Moldova

From Paul Eggert (2006-03-22):

A previous version of this database
followed Shanks & Pottenger, who write
that Tiraspol switched to Moscow time on 1992-01-19 at 02:00.
However, this is most likely an error, as Moldova declared independence
on 1991-08-27 (the 1992-01-19 date is that of a Russian decree).
In early 1992 there was large-scale interethnic violence in the area
and it's possible that some Russophones continued to observe Moscow time.
But [two people] separately reported via
Jesper Norgaard that as of 2001-01-24 Tiraspol was like Chisinau.
The Tiraspol entry has therefore been removed for now.

#

From Alexander Krivenyshev (2011-10-17):

Pridnestrovian Moldavian Republic (PMR, also known as
"Pridnestrovie") has abolished seasonal clock change (no transition
to the Winter Time).

#

News (in Russian):

http://www.kyivpost.ua/russia/news/pridnestrove-otkazalos-ot-perehoda-na-zimnee-vremya-30954.html

#

http://www.allmoldova.com/moldova-news/1249064116.html

#

The substance of this change (reinstatement of the Tiraspol entry)

is from a patch from Petr Machata (2011-10-17)

#

From Tim Parenti (2011-10-19)

In addition, being situated at +4651+2938 would give Tiraspol

a pre-1880 LMT offset of 1:58:32.

#

(which agrees with the earlier entry that had been removed)

From Alexander Krivenyshev (2011-10-26)
NO need to divide Moldova into two timezones at this point.
As of today, Transnistria (Pridnestrovie)- Tiraspol reversed its own
decision to abolish DST this winter.
Following Moldova and neighboring Ukraine- Transnistria (Pridnestrovie)-
Tiraspol will go back to winter time on October 30, 2011.
News from Moldova (in russian):

http://ru.publika.md/link_317061.html

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Europe/Chisinau 1:55:20

- LMT 1880

1:55 - CMT 1918 Feb 15 # Chisinau MT

1:44:24 - BMT 1931 Jul 24 # Bucharest MT

2:00 Romania EE%sT 1940 Aug 15

2:00 1:00 EEST 1941 Jul 17

1:00 C-Eur CE%sT 1944 Aug 24

3:00 Russia MSK/MSD 1990

3:00 - MSK 1990 May 6

2:00 - EET 1991

2:00 Russia EE%sT 1992

2:00 E-Eur EE%sT 1997

See Romania commentary for the guessed 1997 transition to EU rules.

2:00 EU EE%sT

Monaco

Shanks & Pottenger give 0:09:20 for Paris Mean Time; go with Howse's

more precise 0:09:21.

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Europe/Monaco 0:29:32 - LMT 1891 Mar 15

0:09:21 - PMT 1911 Mar 11 # Paris Mean Time

0:00 France WE%sT 1945 Sep 16 3:00

1:00 France CE%sT 1977

1:00 EU CE%sT

Montenegro

see Serbia

Netherlands

Howse writes that the Netherlands' railways used GMT between 1892 and 1940,

but for other purposes the Netherlands used Amsterdam mean time.

However, Robert H. van Gent writes (2001-04-01):
Howse's statement is only correct
up to 1909. From 1909-05-01 (00:00:00
Amsterdam mean time) onwards, the whole of the Netherlands (including
the Dutch railways) was required by law to observe Amsterdam mean time
(19 minutes 32.13 seconds ahead of GMT). This had already been the
common practice (except for the railways) for many decades but it was
not until 1909 when the Dutch government finally defined this by law.
On 1937-07-01 this was changed to 20 minutes (exactly) ahead of GMT and
was generally known as Dutch Time ("Nederlandse Tijd").

(2001-04-08):
1892-05-01 was the date when the Dutch railways were by law required to
observe GMT while the remainder of the Netherlands adhered to the common
practice of following Amsterdam mean time.

(2001-04-09):
In 1835 the authorities of the province of North Holland requested the
municipal authorities of the towns and cities in the province to observe
Amsterdam mean time but I do not know in how many cases this request was
actually followed.

From 1852 onwards the Dutch telegraph offices were by law required to
observe Amsterdam mean time. As the time signals from the observatory of
Leiden were also distributed by the telegraph system, I assume that most
places linked up with the telegraph (and railway) system automatically
adopted Amsterdam mean time.

Although the early Dutch railway companies initially observed a variety
of times, most of them had adopted Amsterdam mean time by 1858 but it
was not until 1866 when they were all required by law to observe
Amsterdam mean time.

The data before 1945 are taken from
<<http://www.phys.uu.nl/~vgent/wettijd/wettijd.htm>>.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Neth 1916 only - May 1 0:00 1:00 NST # Netherlands Summer Time
Rule Neth 1916 only - Oct 1 0:00 0 AMT # Amsterdam Mean Time
Rule Neth 1917 only - Apr 16 2:00s 1:00 NST
Rule Neth 1917 only - Sep 17 2:00s 0 AMT
Rule Neth 1918 1921 - Apr Mon>=1 2:00s 1:00 NST
Rule Neth 1918 1921 - Sep lastMon 2:00s 0 AMT
Rule Neth 1922 only - Mar lastSun 2:00s 1:00 NST
Rule Neth 1922 1936 - Oct Sun>=2 2:00s 0 AMT
Rule Neth 1923 only - Jun Fri>=1 2:00s 1:00 NST
Rule Neth 1924 only - Mar lastSun 2:00s 1:00 NST

```

Rule Neth 1925 only - Jun Fri>=1 2:00s 1:00 NST
#
From 1926 through 1939 DST began 05-15, except that it was delayed by a week
# in years when 05-15 fell in the Pentecost weekend.
Rule Neth 1926 1931 - May 15 2:00s 1:00 NST
Rule Neth 1932 only - May 22 2:00s 1:00 NST
Rule Neth 1933 1936 - May 15 2:00s 1:00 NST
Rule Neth 1937 only - May 22 2:00s 1:00 NST
Rule Neth 1937 only - Jul 1 0:00 1:00 S
Rule Neth 1937 1939 - Oct Sun>=2 2:00s 0 -
Rule Neth 1938 1939 - May 15 2:00s 1:00 S
Rule Neth 1945 only - Apr 2 2:00s 1:00 S
Rule Neth 1945 only - Sep 16 2:00s 0 -
#
# Amsterdam Mean Time was +00:19:32.13 exactly, but the .13 is omitted
# below because the current format requires GMTOFF to be an integer.
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Amsterdam 0:19:32 - LMT 1835
0:19:32 Neth %s 1937
Jul 1
0:20 Neth NE%sT 1940 May 16 0:00 # Dutch Time
1:00 C-Eur CE%sT 1945 Apr 2 2:00
1:00 Neth CE%sT 1977
1:00 EU CE%sT

# Norway
# http://met.no/met/met_lex/q_u/sommertid.html (2004-01) agrees with Shanks &
# Pottenger.
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Norway 1916 only - May 22 1:00 1:00 S
Rule Norway 1916 only - Sep 30 0:00 0 -
Rule Norway 1945 only - Apr 2 2:00s 1:00 S
Rule Norway 1945 only - Oct 1 2:00s 0 -
Rule Norway 1959 1964 - Mar Sun>=15 2:00s 1:00 S
Rule Norway 1959 1965 - Sep Sun>=15 2:00s 0 -
Rule Norway 1965 only - Apr 25 2:00s 1:00 S
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Oslo 0:43:00 - LMT 1895 Jan 1
1:00 Norway CE%sT 1940 Aug 10 23:00
1:00 C-Eur CE%sT 1945 Apr 2 2:00
1:00 Norway CE%sT 1980
1:00 EU CE%sT

# Svalbard & Jan Mayen

# From Steffen Thorsen (2001-05-01):
# Although I could not find it explicitly, it seems that Jan Mayen and
# Svalbard have been using the same time as Norway

```

at least since the
time they were declared as parts of Norway. Svalbard was declared
as a part of Norway by law of 1925-07-17 no 11, section 4 and Jan
Mayen by law of 1930-02-27 no 2, section 2. (From
<http://www.lovddata.no/all/nl-19250717-011.html> and
<http://www.lovddata.no/all/nl-19300227-002.html>). The law/regulation
for normal/standard time in Norway is from 1894-06-29 no 1 (came
into operation on 1895-01-01) and Svalbard/Jan Mayen seem to be a
part of this law since 1925/1930. (From
<http://www.lovddata.no/all/nl-18940629-001.html>) I have not been
able to find if Jan Mayen used a different time zone (e.g. -0100)
before 1930. Jan Mayen has only been "inhabited" since 1921 by
Norwegian meteorologists and maybe used the same time as Norway ever
since 1921. Svalbard (Arctic/Longyearbyen) has been inhabited since
before 1895, and therefore probably changed the local time somewhere
between 1895 and 1925 (inclusive).

From Paul Eggert (2001-05-01):

#

Actually,

Jan Mayen was never occupied by Germany during World War II,
so it must have diverged from Oslo time during the war, as Oslo was
keeping Berlin time.

#

<http://home.no.net/janmayen/history.htm> says that the meteorologists
burned down their station in 1940 and left the island, but returned in
1941 with a small Norwegian garrison and continued operations despite
frequent air attacks from Germans. In 1943 the Americans established a
radiolocating station on the island, called "Atlantic City". Possibly
the UTC offset changed during the war, but I think it unlikely that
Jan Mayen used German daylight-saving rules.

#

Svalbard is more complicated, as it was raided in August 1941 by an
Allied party that evacuated the civilian population to England (says
<http://www.bartleby.com/65/sv/Svalbard.html>). The Svalbard FAQ
<http://www.svalbard.com/SvalbardFAQ.html> says that the Germans were
expelled on 1942-05-14. However, small parties of Germans did return,

#

and according to Wilhelm Dege's book "War North of 80" (1954)
<http://www.ucalgary.ca/UofC/departments/UP/1-55238/1-55238-110-2.html>
the German armed forces at the Svalbard weather station code-named
Haudegen did not surrender to the Allies until September 1945.

#

All these events predate our cutoff date of 1970. Unless we can
come up with more definitive info about the timekeeping during the
war years it's probably best just do...the following for now:

Link Europe/Oslo Arctic/Longyearbyen


```

# Poland
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Poland 1918 1919 - Sep 16 2:00s 0 -
Rule Poland 1919 only - Apr 15 2:00s 1:00 S
Rule Poland 1944 only - Apr 3 2:00s 1:00 S
# Whitman gives 1944 Nov 30; go with Shanks & Pottenger.
Rule Poland 1944 only - Oct 4 2:00 0 -
# For 1944-1948 Whitman gives the previous day; go with Shanks & Pottenger.
Rule Poland 1945 only - Apr 29 0:00 1:00 S
Rule Poland 1945 only - Nov 1 0:00 0 -
# For 1946 on the source is Kazimierz Borkowski,
#
# Torun Center for Astronomy, Dept. of Radio Astronomy, Nicolaus Copernicus U.,
# <http://www.astro.uni.torun.pl/~kb/Artykuly/U-PA/Czas2.htm#tth\_tAb1>
# Thanks to Przemyslaw Augustyniak (2005-05-28) for this reference.
# He also gives these further references:
# Mon Pol nr 13, poz 162 (1995) <http://www.abc.com.pl/serwis/mp/1995/0162.htm>
# Druk nr 2180 (2003) <http://www.senat.gov.pl/k5/dok/sejm/053/2180.pdf>
Rule Poland 1946 only - Apr 14 0:00s 1:00 S
Rule Poland 1946 only - Oct 7 2:00s 0 -
Rule Poland 1947 only - May 4 2:00s 1:00 S
Rule Poland 1947 1949 - Oct Sun>=1 2:00s 0 -
Rule Poland 1948 only - Apr 18 2:00s 1:00 S
Rule Poland 1949 only - Apr 10 2:00s 1:00 S
Rule Poland 1957 only - Jun 2 1:00s 1:00 S
Rule Poland 1957 1958 - Sep lastSun 1:00s 0 -
Rule Poland 1958 only - Mar 30 1:00s 1:00 S
Rule Poland 1959 only - May 31 1:00s 1:00 S
Rule Poland 1959 1961 - Oct Sun>=1 1:00s 0 -
Rule Poland 1960 only - Apr 3 1:00s 1:00 S
Rule Poland 1961 1964 - May lastSun 1:00s 1:00 S
Rule Poland 1962 1964 - Sep lastSun 1:00s 0 -
#
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Warsaw 1:24:00 - LMT 1880
1:24:00 - WMT 1915 Aug 5 # Warsaw Mean Time
1:00 C-Eur CE%sT 1918 Sep 16 3:00
2:00 Poland EE%sT 1922 Jun
1:00 Poland CE%sT 1940 Jun 23 2:00
1:00 C-Eur CE%sT 1944 Oct
1:00 Poland CE%sT 1977
1:00 W-Eur CE%sT 1988
1:00 EU CE%sT

# Portugal
#
# From Rui Pedro Salgueiro (1992-11-12):
# Portugal has recently (September, 27) changed timezone

```

(from WET to MET or CET) to harmonize with EEC.

Martin Bruckmann (1996-02-29) reports via Peter Ilieve
that Portugal is reverting to 0:00 by not moving its clocks this spring.
The new Prime Minister was fed up with getting up in the dark in the winter.

From Paul Eggert (1996-11-12):
IATA SSIM (1991-09) reports several 1991-09 and 1992-09 transitions
at 02:00u, not 01:00u. Assume that these are typos.
IATA SSIM (1991/1992) reports that the Azores were at -1:00.
IATA SSIM (1993-02) says +0:00;
later issues (through 1996-09) say -1:00.
Guess that the Azores changed to EU rules in 1992 (since that's when Portugal
harmonized with the EU), and that they stayed +0:00 that winter.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
DSH writes that despite Decree 1,469 (1915), the change to the clocks was not
done every year, depending on what Spain did, because of railroad schedules.
Go with Shanks & Pottenger.
Rule Port 1916 only - Jun 17 23:00 1:00 S
Whitman gives 1916 Oct 31; go with Shanks & Pottenger.
Rule Port 1916 only - Nov 1 1:00 0 -
Rule Port 1917 only - Feb 28 23:00s 1:00 S
Rule Port 1917 1921 - Oct 14 23:00s 0 -
Rule Port 1918 only - Mar 1 23:00s 1:00 S
Rule Port 1919 only - Feb 28 23:00s 1:00 S
Rule Port 1920 only - Feb 29 23:00s 1:00 S
Rule Port 1921 only - Feb 28 23:00s 1:00 S
Rule Port 1924 only - Apr 16 23:00s 1:00 S
Rule Port 1924 only - Oct 14 23:00s 0 -
Rule Port 1926 only - Apr 17 23:00s 1:00 S
Rule Port 1926 1929 - Oct Sat>=1 23:00s 0 -
Rule Port 1927 only - Apr
9 23:00s 1:00 S
Rule Port 1928 only - Apr 14 23:00s 1:00 S
Rule Port 1929 only - Apr 20 23:00s 1:00 S
Rule Port 1931 only - Apr 18 23:00s 1:00 S
Whitman gives 1931 Oct 8; go with Shanks & Pottenger.
Rule Port 1931 1932 - Oct Sat>=1 23:00s 0 -
Rule Port 1932 only - Apr 2 23:00s 1:00 S
Rule Port 1934 only - Apr 7 23:00s 1:00 S
Whitman gives 1934 Oct 5; go with Shanks & Pottenger.
Rule Port 1934 1938 - Oct Sat>=1 23:00s 0 -
Shanks & Pottenger give 1935 Apr 30; go with Whitman.
Rule Port 1935 only - Mar 30 23:00s 1:00 S
Rule Port 1936 only - Apr 18 23:00s 1:00 S
Whitman gives 1937 Apr 2; go with Shanks & Pottenger.
Rule Port 1937 only - Apr 3 23:00s 1:00 S

Rule Port 1938 only - Mar 26 23:00s 1:00 S
 Rule Port 1939 only - Apr 15 23:00s 1:00 S
 # Whitman gives 1939 Oct 7; go with Shanks & Pottenger.
 Rule Port 1939 only - Nov 18 23:00s 0 -
 Rule Port 1940 only - Feb 24 23:00s 1:00 S
 # Shanks & Pottenger give 1940 Oct 7; go with Whitman.
 Rule Port 1940 1941 - Oct
 5 23:00s 0 -
 Rule Port 1941 only - Apr 5 23:00s 1:00 S
 Rule Port 1942 1945 - Mar Sat>=8 23:00s 1:00 S
 Rule Port 1942 only - Apr 25 22:00s 2:00 M # Midsummer
 Rule Port 1942 only - Aug 15 22:00s 1:00 S
 Rule Port 1942 1945 - Oct Sat>=24 23:00s 0 -
 Rule Port 1943 only - Apr 17 22:00s 2:00 M
 Rule Port 1943 1945 - Aug Sat>=25 22:00s 1:00 S
 Rule Port 1944 1945 - Apr Sat>=21 22:00s 2:00 M
 Rule Port 1946 only - Apr Sat>=1 23:00s 1:00 S
 Rule Port 1946 only - Oct Sat>=1 23:00s 0 -
 Rule Port 1947 1949 - Apr Sun>=1 2:00s 1:00 S
 Rule Port 1947 1949 - Oct Sun>=1 2:00s 0 -
 # Shanks & Pottenger say DST was observed in 1950; go with Whitman.
 # Whitman gives Oct lastSun for 1952 on; go with Shanks & Pottenger.
 Rule Port 1951 1965 - Apr Sun>=1 2:00s 1:00 S
 Rule Port 1951 1965 - Oct Sun>=1 2:00s 0 -
 Rule Port 1977 only - Mar 27 0:00s 1:00 S
 Rule Port 1977 only - Sep 25 0:00s 0 -
 Rule Port 1978 1979 - Apr Sun>=1 0:00s 1:00 S
 Rule Port 1978 only - Oct 1 0:00s 0 -
 Rule Port 1979 1982 - Sep lastSun
 1:00s 0 -
 Rule Port 1980 only - Mar lastSun 0:00s 1:00 S
 Rule Port 1981 1982 - Mar lastSun 1:00s 1:00 S
 Rule Port 1983 only - Mar lastSun 2:00s 1:00 S
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 # Shanks & Pottenger say the transition from LMT to WET occurred 1911-05-24;
 # Willett says 1912-01-01. Go with Willett.
 Zone Europe/Lisbon -0:36:32 - LMT 1884
 -0:36:32 - LMT 1912 Jan 1 # Lisbon Mean Time
 0:00 Port WE%sT 1966 Apr 3 2:00
 1:00 - CET 1976 Sep 26 1:00
 0:00 Port WE%sT 1983 Sep 25 1:00s
 0:00 W-Eur WE%sT 1992 Sep 27 1:00s
 1:00 EU CE%sT 1996 Mar 31 1:00u
 0:00 EU WE%sT
 Zone Atlantic/Azores -1:42:40 - LMT 1884 # Ponta Delgada
 -1:54:32 - HMT 1911 May 24 # Horta Mean Time
 -2:00 Port AZO%sT 1966 Apr 3 2:00 # Azores Time
 -1:00 Port AZO%sT 1983 Sep 25 1:00s

```

-1:00 W-Eur AZO%ST 1992 Sep 27 1:00s
0:00 EU WE%ST 1993 Mar 28 1:00u
-1:00 EU AZO%ST
Zone Atlantic/Madeira -1:07:36 - LMT 1884 # Funchal
-1:07:36 - FMT 1911 May 24 # Funchal Mean
Time
-1:00 Port MAD%ST 1966 Apr 3 2:00 # Madeira Time
0:00 Port WE%ST 1983 Sep 25 1:00s
0:00 EU WE%ST

# Romania
#
# From Paul Eggert (1999-10-07):
# <a href="http://www.nineoclock.ro/POL/1778pol.html">
# Nine O'clock</a> (1998-10-23) reports that the switch occurred at
# 04:00 local time in fall 1998. For lack of better info,
# assume that Romania and Moldova switched to EU rules in 1997,
# the same year as Bulgaria.
#
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Romania 1932 only - May 21 0:00s 1:00 S
Rule Romania 1932 1939 - Oct Sun>=1 0:00s 0 -
Rule Romania 1933 1939 - Apr Sun>=2 0:00s 1:00 S
Rule Romania 1979 only - May 27 0:00 1:00 S
Rule Romania 1979 only - Sep lastSun 0:00 0 -
Rule Romania 1980 only - Apr 5 23:00 1:00 S
Rule Romania 1980 only - Sep lastSun 1:00 0 -
Rule Romania 1991 1993 - Mar lastSun 0:00s 1:00 S
Rule Romania 1991 1993 - Sep lastSun 0:00s 0 -
# Zone NAME GMTOFF RULES FORMAT [UNTIL]
Zone Europe/Bucharest 1:44:24 - LMT 1891 Oct
1:44:24 - BMT 1931
Jul 24 # Bucharest MT
2:00 Romania EE%ST 1981 Mar 29 2:00s
2:00 C-Eur EE%ST 1991
2:00 Romania EE%ST 1994
2:00 E-Eur EE%ST 1997
2:00 EU EE%ST

# Russia

# From Alexander Krivenyshev (2011-09-15):
# Based on last Russian Government Decree # 725 on August 31, 2011
# (Government document
# <a href="http://www.government.ru/gov/results/16355/print/">
# http://www.government.ru/gov/results/16355/print/
# </a>
# in Russian)

```

there are few corrections have to be made for some Russian time zones...
All updated Russian Time Zones were placed in table and translated to English
by WorldTimeZone.com at the link below:

http://www.worldtimezone.com/dst_news/dst_news_russia36.htm

From Sanjeev Gupta (2011-09-27):
Scans of [Decree #23 of January 8, 1992] are available at:

http://government.consultant.ru/page.aspx?1223966

They are in Cyrillic letters (presumably Russian).

From Arthur David Olson (2012-05-09):
Regarding the instant when clocks in time-zone-shifting parts of Russia
changed in September 2011:

One source is

http://government.ru/gov/results/16355/

which, according to translate.google.com, begins "Decree of August 31,
2011 No 725" and contains no other dates or "effective date" information.

Another source is

http://www.rg.ru/2011/09/06/chas-zona-dok.html

which, according to translate.google.com, begins "Resolution of the
Government of the Russian Federation on August 31, 2011 N 725" and also
contains "Date first official publication: September 6, 2011 Posted on:
in the 'RG' - Federal Issue number 5573 September 6, 2011" but which
does not contain any "effective date" information.

Another source is

http://en.wikipedia.org/wiki/Oymyakonsky_District#cite_note-RuTime-7

which, in note 8, contains "Resolution #725 of August 31, 2011...
Effective as of after 7 days following the day of the official publication"
but which does not contain any reference to September 6, 2011.

The Wikipedia article refers to

http://base.consultant.ru/cons/cgi/online.cgi?req=doc;base=LAW;n=118896

which seems to copy the text of the government.ru page.

Tobias Conradi combines Wikipedia's
"as of after 7 days following the day of the official publication"
with www.rg.ru's "Date of first official publication: September 6, 2011" to get
September 13, 2011 as the cutover date (unusually, a Tuesday, as Tobias Conradi notes).

None of the sources indicates a time of day for changing clocks.

Go with 2011-09-13 0:00s.

From Paul Eggert
(2006-03-22):
Except for Moscow after 1919-07-01, I invented the time zone abbreviations.
Moscow time zone abbreviations after 1919-07-01, and Moscow rules after 1991,
are from Andrey A. Chernov. The rest is from Shanks & Pottenger,
except we follow Chernov's report that 1992 DST transitions were Sat
23:00, not Sun 02:00s.

From Stanislaw A. Kuzikowski (1994-06-29):
But now it is some months since Novosibirsk is 3 hours ahead of Moscow!
I do not know why they have decided to make this change;
as far as I remember it was done exactly during winter->summer switching
so we (Novosibirsk) simply did not switch.

From Andrey A. Chernov (1996-10-04):
`MSK' and `MSD' were born and used initially on Moscow computers with
UNIX-like Oses by several developer groups (e.g. Demos group, Kiae group)....
The next step was the UUCP network, the Relcom predecessor
(used mainly for mail), and MSK/MSD was actively used there.

From Chris Carrier (1996-10-30):
According
to a friend of mine who rode the Trans-Siberian Railroad from
Moscow to Irkutsk in 1995, public air and rail transport in Russia ...
still follows Moscow time, no matter where in Russia it is located.

For Grozny, Chechnya, we have the following story from
John Daniszewski, "Scavengers in the Rubble", Los Angeles Times (2001-02-07):
News--often false--is spread by word of mouth. A rumor that it was
time to move the clocks back put this whole city out of sync with
the rest of Russia for two weeks--even soldiers stationed here began
enforcing curfew at the wrong time.

From Gwillim Law (2001-06-05):
There's considerable evidence that Sakhalin Island used to be in
UTC+11, and has changed to UTC+10, in this decade. I start with the
SSIM, which listed Yuzhno-Sakhalinsk in zone RU10 along with Magadan

```

# until February 1997, and then in RU9 with Khabarovsk and Vladivostok
# since September 1997.... Although the Kuril Islands are
# administratively part of
# Sakhalin oblast', they appear to have
# remained on UTC+11 along with Magadan.
#
# Zone NAME GMT+11 RULES FORMAT [UNTIL]
#
# Kaliningradskaya oblast'.
Zone Europe/Kaliningrad 1:22:00 - LMT 1893 Apr
  1:00 C-Eur CE%ST 1945
  2:00 Poland CE%ST 1946
  3:00 Russia MSK/MSD 1991 Mar 31 2:00s
  2:00 Russia EE%ST 2011 Mar 27 2:00s
  3:00 - FET # Further-eastern European Time
#
# From Oscar van Vlijmen (2001-08-25): [This region consists of]
# Respublika Adygeya, Arkhangel'skaya oblast',
# Belgorodskaya oblast', Bryanskaya oblast', Vladimirskaia oblast',
# Vologodskaya oblast', Voronezhskaya oblast',
# Respublika Dagestan, Ivanovskaya oblast', Respublika Ingushetiya,
# Kabardino-Balkarskaya Respublika, Respublika Kalmykiya,
# Kalmyk'skaya oblast', Respublika Karachaevo-Cherkessiya,
# Respublika Kareliya, Respublika Komi,
# Kostromskaya oblast', Krasnodarskiy kraj, Kurskaya oblast',
# Leningradskaya oblast', Lipetskaya oblast', Respublika Marij El,
# Respublika Mordoviya, Moskva, Moskovskaya
# oblast',
# Murmanskaya oblast', Nenetskiy avtonomnyy okrug,
# Nizhegorodskaya oblast', Novgorodskaya oblast', Orlovskaya oblast',
# Penzenskaya oblast', Pskovskaya oblast', Rostovskaya oblast',
# Ryazanskaya oblast', Sankt-Peterburg,
# Respublika Severnaya Osetiya, Smolenskaya oblast',
# Stavropol'skiy kraj, Tambovskaya oblast', Respublika Tatarstan,
# Tverskaya oblast', Tyl'skaya oblast', Ul'yanovskaya oblast',
# Chechenskaya Respublika, Chuvashskaya oblast',
# Yaroslavl'skaya oblast'
Zone Europe/Moscow 2:30:20 - LMT 1880
  2:30 - MMT 1916 Jul 3 # Moscow Mean Time
  2:30:48 Russia %s 1919 Jul 1 2:00
  3:00 Russia MSK/MSD 1922 Oct
  2:00 - EET 1930 Jun 21
  3:00 Russia MSK/MSD 1991 Mar 31 2:00s
  2:00 Russia EE%ST 1992 Jan 19 2:00s
  3:00 Russia MSK/MSD 2011 Mar 27 2:00s
  4:00 - MSK
#
# Astrakhanskaya oblast', Kirovskaya oblast', Saratovskaya oblast',

```

Volgogradskaya oblast'. Shanks & Pottenger say Kirov is still at +0400

but Wikipedia (2006-05-09) says +0300.

Perhaps it switched after the

others? But we have no data.

Zone Europe/Volgograd 2:57:40 - LMT 1920 Jan 3

3:00 - TSAT 1925 Apr 6 # Tsaritsyn Time

3:00 - STAT 1930 Jun 21 # Stalingrad Time

4:00 - STAT 1961 Nov 11

4:00 Russia VOL%ST 1989 Mar 26 2:00s # Volgograd T

3:00 Russia VOL%ST 1991 Mar 31 2:00s

4:00 - VOLT 1992 Mar 29 2:00s

3:00 Russia VOL%ST 2011 Mar 27 2:00s

4:00 - VOLT

#

From Oscar van Vlijmen (2001-08-25): [This region consists of]

Samarskaya oblast', Udmurtskaya respublika

Zone Europe/Samara 3:20:36 - LMT 1919 Jul 1 2:00

3:00 - SAMT 1930 Jun 21

4:00 - SAMT 1935 Jan 27

4:00 Russia KUY%ST 1989 Mar 26 2:00s # Kuybyshev

3:00 Russia KUY%ST 1991 Mar 31 2:00s

2:00 Russia KUY%ST 1991 Sep 29 2:00s

3:00 - KUYT 1991 Oct 20 3:00

4:00 Russia SAM%ST 2010 Mar 28 2:00s # Samara Time

3:00 Russia SAM%ST 2011 Mar 27 2:00s

4:00 - SAMT

#

From Oscar van Vlijmen (2001-08-25): [This region consists of]

Respublika

Bashkortostan, Komi-Permyatskij avtonomnyj okrug,

Kurganskaya oblast', Orenburgskaya oblast', Permskaya oblast',

Sverdlovskaya oblast', Tyumenskaya oblast',

Khanty-Manskijskij avtonomnyj okrug, Chelyabinskaya oblast',

Yamalo-Nenetskij avtonomnyj okrug.

Zone Asia/Yekaterinburg 4:02:24 - LMT 1919 Jul 15 4:00

4:00 - SVET 1930 Jun 21 # Sverdlovsk Time

5:00 Russia SVE%ST 1991 Mar 31 2:00s

4:00 Russia SVE%ST 1992 Jan 19 2:00s

5:00 Russia YEK%ST 2011 Mar 27 2:00s

6:00 - YEKT # Yekaterinburg Time

#

From Oscar van Vlijmen (2001-08-25): [This region consists of]

Respublika Altaj, Altajskij kraj, Omskaya oblast'.

Zone Asia/Omsk 4:53:36 - LMT 1919 Nov 14

5:00 - OMST 1930 Jun 21 # Omsk Time

6:00 Russia OMS%ST 1991 Mar 31 2:00s

5:00 Russia OMS%ST 1992 Jan 19 2:00s

6:00 Russia OMS%ST 2011 Mar 27 2:00s
7:00 - OMST

#

From Paul Eggert (2006-08-19): I'm guessing about Tomsk here; it's
not clear when it switched from +7 to +6.
Novosibirskaya
oblast', Tomskaya oblast'.

Zone Asia/Novosibirsk 5:31:40 - LMT 1919 Dec 14 6:00

6:00 - NOVT 1930 Jun 21 # Novosibirsk Time
7:00 Russia NOV%ST 1991 Mar 31 2:00s
6:00 Russia NOV%ST 1992 Jan 19 2:00s
7:00 Russia NOV%ST 1993 May 23 # say Shanks & P.
6:00 Russia NOV%ST 2011 Mar 27 2:00s
7:00 - NOVT

From Alexander Krivenyshev (2009-10-13):
Kemerovo oblast' (Kemerovo region) in Russia will change current time zone on
March 28, 2010:
from current Russia Zone 6 - Krasnoyarsk Time Zone (KRA) UTC +0700
to Russia Zone 5 - Novosibirsk Time Zone (NOV) UTC +0600

This is according to Government of Russia decree # 740, on September
14, 2009 "Application in the territory of the Kemerovo region the Fifth
time zone." ("Russia Zone 5" or old "USSR Zone 5" is GMT +0600)

Russian Government web site (Russian language)

http://www.government.ru/content/governmentactivity/rfgovernmentdecisions/archive/2009/09/14/991633.htm

or Russian-English translation by WorldTimeZone.com with reference
map to local region and new Russia Time Zone map after March 28, 2010

http://www.worldtimezone.com/dst_news/dst_news_russia03.html

Thus, when Russia will switch to DST on the night of March 28, 2010
Kemerovo region (Kemerovo oblast') will not change the clock.

As a result, Kemerovo oblast' will be in the same time zone as
Novosibirsk, Omsk, Tomsk, Barnaul and Altai Republic.

Zone Asia/Novokuznetsk 5:48:48 - NMT 1920 Jan 6

6:00 - KRAT 1930 Jun 21 # Krasnoyarsk Time
7:00 Russia KRA%ST 1991 Mar 31 2:00s
6:00 Russia KRA%ST 1992 Jan 19 2:00s
7:00 Russia KRA%ST 2010 Mar 28 2:00s
6:00 Russia NOV%ST 2011 Mar 27 2:00s

7:00 - NOVT # Novosibirsk/Novokuznetsk Time

#

From Oscar van Vlijmen (2001-08-25): [This region consists of]

Krasnoyarskij kraj,

#

Tajmyrskij (Dolgano-Nenetskij) avtonomnyj okrug,

Respublika Tuva, Respublika Khakasiya, Evenkijskij avtonomnyj okrug.

Zone Asia/Krasnoyarsk 6:11:20 - LMT 1920 Jan 6

6:00 - KRAT 1930 Jun 21 # Krasnoyarsk Time

7:00 Russia KRA%ST 1991 Mar 31 2:00s

6:00 Russia KRA%ST 1992 Jan 19 2:00s

7:00 Russia KRA%ST 2011 Mar 27 2:00s

8:00 - KRAT

#

From Oscar van Vlijmen (2001-08-25): [This region consists of]

Respublika Buryatiya, Irkutskaya oblast',

Ust'-Ordynskij Buryatskij avtonomnyj okrug.

Zone Asia/Irkutsk 6:57:20 - LMT 1880

6:57:20 - IMT 1920 Jan 25 # Irkutsk Mean Time

7:00 - IRKT 1930 Jun 21 # Irkutsk Time

8:00 Russia IRK%ST 1991 Mar 31 2:00s

7:00 Russia IRK%ST 1992 Jan 19 2:00s

8:00 Russia IRK%ST 2011 Mar 27 2:00s

9:00 - IRKT

#

From Oscar van Vlijmen (2003-10-18): [This region consists of]

Aginskij Buryatskij avtonomnyj okrug, Amurskaya oblast',

[parts of] Respublika Sakha (Yakutiya), Chitinskaya oblast'.

From Oscar van Vlijmen

(2009-11-29):

...some regions of [Russia] were merged with others since 2005...

Some names were changed, no big deal, except for one instance: a new name.

YAK/YAKST: UTC+9 Zabajkal'skij kraj.

From Oscar van Vlijmen (2009-11-29):

The Sakha districts are: Aldanskij, Amginskij, Anabarskij,

Verkhnevilyujskij, Vilyujskij, Gornyj,

Zhiganskij, Kobyajskij, Lenskij, Megino-Kangalasskij, Mirninskij,

Namskij, Nyurbinskij, Olenyokskij, Olyokminskij,

Suntarskij, Tattinskij, Ust'-Aldanskij, Khangalasskij,

Churapchinskij, Eveno-Bytantajskij Natsional'nij.

Zone Asia/Yakutsk 8:38:40 - LMT 1919 Dec 15

8:00 - YAKT 1930 Jun 21 # Yakutsk Time

9:00 Russia YAK%ST 1991 Mar 31 2:00s

8:00 Russia YAK%ST 1992 Jan 19 2:00s

9:00 Russia YAK%ST 2011 Mar 27 2:00s
10:00 - YAKT

From Oscar van Vlijmen (2003-10-18): [This region consists of]
Evrejskaya avtonomnaya oblast', Khabarovskij kraj, Primorskij kraj,
[parts of] Respublika Sakha (Yakutiya).

From Oscar van Vlijmen
(2009-11-29):
The Sakha districts are: Bulunskij, Verkhoyanskij, ... Ust'-Yanskij.
Zone Asia/Vladivostok 8:47:44 - LMT 1922 Nov 15
9:00 - VLAT 1930 Jun 21 # Vladivostok Time
10:00 Russia VLA%ST 1991 Mar 31 2:00s
9:00 Russia VLA%ST 1992 Jan 19 2:00s
10:00 Russia VLA%ST 2011 Mar 27 2:00s
11:00 - VLAT

From Arthur David Olson (2012-05-09):
Tomponskij and Ust'-Majskij switched from Vladivostok time to Yakutsk time
in 2011.

From Paul Eggert (2012-11-25):
Shanks and Pottenger (2003) has Khandyga on Yakutsk time.
Make a wild guess that it switched to Vladivostok time in 2004.
This transition is no doubt wrong, but we have no better info.

Zone Asia/Khandyga 9:02:13 - LMT 1919 Dec 15
8:00 - YAKT 1930 Jun 21 # Yakutsk Time
9:00 Russia YAK%ST 1991 Mar 31 2:00s
8:00 Russia YAK%ST 1992 Jan 19 2:00s
9:00 Russia YAK%ST 2004
10:00 Russia VLA%ST 2011 Mar 27 2:00s
11:00 - VLAT 2011 Sep 13 0:00s # Decree 725?
10:00 - YAKT

Sakhalinskaya
oblast'.
The Zone name should be Yuzhno-Sakhalinsk, but that's too long.
Zone Asia/Sakhalin 9:30:48 - LMT 1905 Aug 23
9:00 - CJT 1938
9:00 - JST 1945 Aug 25
11:00 Russia SAK%ST 1991 Mar 31 2:00s # Sakhalin T.
10:00 Russia SAK%ST 1992 Jan 19 2:00s
11:00 Russia SAK%ST 1997 Mar lastSun 2:00s
10:00 Russia SAK%ST 2011 Mar 27 2:00s
11:00 - SAKT

#

From Oscar van Vlijmen (2003-10-18): [This region consists of]

Magadanskaya oblast', Respublika Sakha (Yakutiya).

Probably also: Kuril Islands.

From Oscar van Vlijmen (2009-11-29):

The Sakha districts are: Abyjskij, Allaikhovskij, Verkhhhnekolymskij, Momskij,

Nizhnekolymskij, ... Srednekolymskij.

Zone Asia/Magadan 10:03:12 - LMT 1924 May 2

10:00 - MAGT 1930 Jun 21 # Magadan Time

11:00 Russia MAG%ST 1991 Mar 31 2:00s

10:00 Russia MAG%ST 1992 Jan 19 2:00s

11:00 Russia MAG%ST 2011 Mar 27 2:00s

12:00 - MAGT

From Arthur David Olson (2012-05-09):

Ojmyakonskij and the Kuril Islands switched
from

Magadan time to Vladivostok time in 2011.

Zone Asia/Ust-Nera 9:32:54 - LMT 1919 Dec 15

8:00 - YAKT 1930 Jun 21 # Yakutsk Time

9:00 Russia YAKT 1981 Apr 1

11:00 Russia MAG%ST 1991 Mar 31 2:00s

10:00 Russia MAG%ST 1992 Jan 19 2:00s

11:00 Russia MAG%ST 2011 Mar 27 2:00s

12:00 - MAGT 2011 Sep 13 0:00s # Decree 725?

11:00 - VLAT

From Oscar van Vlijmen (2001-08-25): [This region consists of]

Kamchatskaya oblast', Koryakskij avtonomnyj okrug.

#

The Zone name should be Asia/Petropavlovsk-Kamchatski, but that's too long.

Zone Asia/Kamchatka 10:34:36 - LMT 1922 Nov 10

11:00 - PETT 1930 Jun 21 # P-K Time

12:00 Russia PET%ST 1991 Mar 31 2:00s

11:00 Russia PET%ST 1992 Jan 19 2:00s

12:00 Russia PET%ST 2010 Mar 28 2:00s

11:00 Russia PET%ST 2011 Mar 27 2:00s

12:00 - PETT

#

Chukotskij avtonomnyj okrug

Zone Asia/Anadyr 11:49:56 - LMT 1924 May 2

12:00 - ANAT 1930 Jun 21 # Anadyr Time

13:00 Russia ANA%ST 1982 Apr 1 0:00s

12:00 Russia ANA%ST 1991

Mar 31 2:00s

11:00 Russia ANA%ST 1992 Jan 19 2:00s

12:00 Russia ANA%ST 2010 Mar 28 2:00s

11:00 Russia ANA%ST 2011 Mar 27 2:00s

12:00 - ANAT

Serbia

Zone NAME GMTOFF RULES FORMAT [UNTIL]

Zone Europe/Belgrade 1:22:00 - LMT 1884

1:00 - CET 1941 Apr 18 23:00

1:00 C-Eur CE%ST 1945

1:00 - CET 1945 May 8 2:00s

1:00 1:00 CEST 1945 Sep 16 2:00s

Metod Kozelj reports that the legal date of

transition to EU rules was 1982-11-27, for all of Yugoslavia at the time.

Shanks & Pottenger don't give as much detail, so go with Kozelj.

1:00 - CET 1982 Nov 27

1:00 EU CE%ST

Link Europe/Belgrade Europe/Ljubljana # Slovenia

Link Europe/Belgrade Europe/Podgorica # Montenegro

Link Europe/Belgrade Europe/Sarajevo # Bosnia and Herzegovina

Link Europe/Belgrade Europe/Skopje # Macedonia

Link Europe/Belgrade Europe/Zagreb # Croatia

Slovakia

Link Europe/Prague Europe/Bratislava

Slovenia

see Serbia

Spain

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

For

1917-1919 Whitman gives Apr Sat>=1 - Oct Sat>=1;

go with Shanks & Pottenger.

Rule Spain 1917 only - May 5 23:00s 1:00 S

Rule Spain 1917 1919 - Oct 6 23:00s 0 -

Rule Spain 1918 only - Apr 15 23:00s 1:00 S

Rule Spain 1919 only - Apr 5 23:00s 1:00 S

Whitman gives 1921 Feb 28 - Oct 14; go with Shanks & Pottenger.

Rule Spain 1924 only - Apr 16 23:00s 1:00 S

Whitman gives 1924 Oct 14; go with Shanks & Pottenger.

Rule Spain 1924 only - Oct 4 23:00s 0 -

Rule Spain 1926 only - Apr 17 23:00s 1:00 S

Whitman says no DST in 1929; go with Shanks & Pottenger.

Rule Spain 1926 1929 - Oct Sat>=1 23:00s 0 -

Rule Spain 1927 only - Apr 9 23:00s 1:00 S

Rule Spain 1928 only - Apr 14 23:00s 1:00 S

Rule Spain 1929 only - Apr 20 23:00s 1:00 S

Whitman gives 1937 Jun 16, 1938 Apr 16, 1940 Apr 13;

go with Shanks & Pottenger.

Rule Spain 1937 only - May 22 23:00s 1:00 S

Rule Spain 1937 1939 - Oct Sat>=1 23:00s 0 -
 Rule Spain 1938 only - Mar 22 23:00s 1:00 S
 Rule Spain 1939 only - Apr 15 23:00s 1:00 S
 Rule Spain 1940 only - Mar 16 23:00s 1:00 S
 #
 Whitman says no DST 1942-1945; go with Shanks & Pottenger.
 Rule Spain 1942 only - May 2 22:00s 2:00 M # Midsummer
 Rule Spain 1942 only - Sep 1 22:00s 1:00 S
 Rule Spain 1943 1946 - Apr Sat>=13 22:00s 2:00 M
 Rule Spain 1943 only - Oct 3 22:00s 1:00 S
 Rule Spain 1944 only - Oct 10 22:00s 1:00 S
 Rule Spain 1945 only - Sep 30 1:00 1:00 S
 Rule Spain 1946 only - Sep 30 0:00 0 -
 Rule Spain 1949 only - Apr 30 23:00 1:00 S
 Rule Spain 1949 only - Sep 30 1:00 0 -
 Rule Spain 1974 1975 - Apr Sat>=13 23:00 1:00 S
 Rule Spain 1974 1975 - Oct Sun>=1 1:00 0 -
 Rule Spain 1976 only - Mar 27 23:00 1:00 S
 Rule Spain 1976 1977 - Sep lastSun 1:00 0 -
 Rule Spain 1977 1978 - Apr 2 23:00 1:00 S
 Rule Spain 1978 only - Oct 1 1:00 0 -
 # The following rules are copied from Morocco from 1967 through 1978.
 Rule SpainAfrica 1967 only - Jun 3 12:00 1:00 S
 Rule SpainAfrica 1967 only - Oct 1 0:00 0 -
 Rule SpainAfrica 1974 only - Jun 24 0:00 1:00 S
 Rule SpainAfrica
 1974 only - Sep 1 0:00 0 -
 Rule SpainAfrica 1976 1977 - May 1 0:00 1:00 S
 Rule SpainAfrica 1976 only - Aug 1 0:00 0 -
 Rule SpainAfrica 1977 only - Sep 28 0:00 0 -
 Rule SpainAfrica 1978 only - Jun 1 0:00 1:00 S
 Rule SpainAfrica 1978 only - Aug 4 0:00 0 -
 # Zone NAME GMTOFF RULES FORMAT [UNTIL]
 Zone Europe/Madrid -0:14:44 - LMT 1901 Jan 1 0:00s
 0:00 Spain WE%sT 1946 Sep 30
 1:00 Spain CE%sT 1979
 1:00 EU CE%sT
 Zone Africa/Ceuta -0:21:16 - LMT 1901
 0:00 - WET 1918 May 6 23:00
 0:00 1:00 WEST 1918 Oct 7 23:00
 0:00 - WET 1924
 0:00 Spain WE%sT 1929
 0:00 SpainAfrica WE%sT 1984 Mar 16
 1:00 - CET 1986
 1:00 EU CE%sT
 Zone Atlantic/Canary -1:01:36 - LMT 1922 Mar # Las Palmas de Gran C.
 -1:00 - CANT 1946 Sep 30 1:00 # Canaries Time
 0:00 - WET 1980 Apr 6 0:00s

0:00 1:00 WEST 1980 Sep 28 0:00s
0:00 EU WE%ST
IATA SSIM (1996-09) says the Canaries switch at 2:00u, not 1:00u.
Ignore this for now, as the Canaries are part of the
EU.

Sweden

From Ivan Nilsson (2001-04-13), superseding Shanks & Pottenger:

The law "Svensk forfattningssamling 1878, no 14" about standard time in 1879:
From the beginning of 1879 (that is 01-01 00:00) the time for all
places in the country is "the mean solar time for the meridian at
three degrees, or twelve minutes of time, to the west of the
meridian of the Observatory of Stockholm". The law is dated 1878-05-31.

The observatory at that time had the meridian 18 degrees 03' 30"
eastern longitude = 01:12:14 in time. Less 12 minutes gives the
national standard time as 01:00:14 ahead of GMT....

About the beginning of CET in Sweden. The lawtext ("Svensk
forfattningssamling 1899, no 44") states, that "from the beginning
of 1900... .. the same as the mean solar time for the meridian at
the distance of one hour of time from the meridian of the English
observatory at Greenwich, or at 12 minutes 14 seconds to the west
from the meridian of the Observatory
of Stockholm". The law is dated
1899-06-16. In short: At 1900-01-01 00:00:00 the new standard time
in Sweden is 01:00:00 ahead of GMT.

1916: The lawtext ("Svensk forfattningssamling 1916, no 124") states
that "1916-05-15 is considered to begin one hour earlier". It is
pretty obvious that at 05-14 23:00 the clocks are set to 05-15 00:00....
Further the law says, that "1916-09-30 is considered to end one hour later".

The laws regulating [DST] are available on the site of the Swedish
Parliament beginning with 1985 - the laws regulating 1980/1984 are
not available on the site (to my knowledge they are only available
in Swedish): <<http://www.riksdagen.se/english/work/sfst.asp>> (type
"sommartid" without the quotes in the field "Fritext" and then click
the Sok-button).

(2001-05-13):

I have now found a newspaper stating that at 1916-10-01 01:00
summertime the church-clocks etc were set back one hour to show
1916-10-01 00:00 standard time. The article

also reports that some
people thought the switch to standard time would take place already
at 1916-10-01 00:00 summer time, but they had to wait for another
hour before the event took place.

Source: The newspaper "Dagens Nyheter", 1916-10-01, page 7 upper left.

Zone NAME GMTTOFF RULES FORMAT [UNTIL]

Zone Europe/Stockholm 1:12:12 - LMT 1879 Jan 1

1:00:14 - SET 1900 Jan 1 # Swedish Time

1:00 - CET 1916 May 14 23:00

1:00 1:00 CEST 1916 Oct 1 01:00

1:00 - CET 1980

1:00 EU CE%sT

Switzerland

From Howse:

By the end of the 18th century clocks and watches became commonplace
and their performance improved enormously. Communities began to keep
mean time in preference to apparent time -- Geneva from 1780

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

From Whitman (who writes ``Midnight?"):

Rule Swiss 1940 only - Nov 2 0:00 1:00 S

Rule Swiss 1940 only - Dec 31 0:00 0 -

From Shanks & Pottenger:

Rule Swiss 1941 1942 - May Sun>=1 2:00 1:00 S

#

Rule Swiss 1941 1942 - Oct Sun>=1 0:00 0 -

From Alois Treindl (2008-12-17):

I have researched the DST usage in Switzerland during the 1940ies.

#

As I wrote in an earlier message, I suspected the current tzdata values
to be wrong. This is now verified.

#

I have found copies of the original ruling by the Swiss Federal

government, in 'Eidgen[ossische Gesetzessammlung 1941 and 1942' (Swiss
federal law collection)...

#

DST began on Monday 5 May 1941, 1:00 am by shifting the clocks to 2:00 am

DST ended on Monday 6 Oct 1941, 2:00 am by shifting the clocks to 1:00 am.

#

DST began on Monday, 4 May 1942 at 01:00 am

DST ended on Monday, 5 Oct 1942 at 02:00 am

#

There was no DST in 1940, I have checked the law collection carefully.

It is also indicated by the fact that the 1942 entry in the law

collection points back to 1941 as a reference, but no reference to any


```

# other years are made.
#
# Newspaper articles I have read in the archives on 6 May 1941 reported
#
# about the introduction of DST (Sommerzeit in German) during the previous
# night as an absolute novelty, because this was the first time that such
# a thing had happened in Switzerland.
#
# I have also checked 1916, because one book source (Gabriel, Traite de
# l'heure dans le monde) claims that Switzerland had DST in 1916. This is
# false, no official document could be found. Probably Gabriel got misled
# by references to Germany, which introduced DST in 1916 for the first time.
#
# The tzdata rules for Switzerland must be changed to:
# Rule Swiss 1941 1942 - May Mon>=1 1:00 1:00 S
# Rule Swiss 1941 1942 - Oct Mon>=1 2:00 0 -
#
# The 1940 rules must be deleted.
#
# One further detail for Switzerland, which is probably out of scope for
# most users of tzdata:
# The zone file
# Zone Europe/Zurich 0:34:08 - LMT 1848 Sep 12
#           0:29:44 - BMT 1894 Jun #Bern Mean Time
#
#           1:00 Swiss CE%sT 1981
#           1:00 EU CE%sT
# describes all of Switzerland correctly, with the exception of
# the Cantone Geneve (Geneva, Genf). Between 1848 and 1894 Geneve did not
# follow Bern Mean Time but kept its own local mean time.
# To represent this, an extra zone would be needed.

# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
Rule Swiss 1941 1942 - May Mon>=1 1:00 1:00 S
Rule Swiss 1941 1942 - Oct Mon>=1 2:00 0 -
# Zone NAME GMTTOFF RULES FORMAT [UNTIL]
Zone Europe/Zurich 0:34:08 - LMT 1848 Sep 12
0:29:44 - BMT 1894 Jun # Bern Mean Time
1:00 Swiss CE%sT 1981
1:00 EU CE%sT

# Turkey

# From Amar Devegowda (2007-01-03):
# The time zone rules for Istanbul, Turkey have not been changed for years now.
# ... The latest rules are available at -
# http://www.timeanddate.com/worldclock/timezone.html?n=107
# From Steffen Thorsen (2007-01-03):

```

I have been able to find press records back to 1996 which all say that
DST started 01:00
local time and end at 02:00 local time. I am not sure
what happened before that. One example for each year from 1996 to 2001:
<http://newspot.byegm.gov.tr/arsiv/1996/21/N4.htm>
<http://www.byegm.gov.tr/YAYINLARIMIZ/CHR/ING97/03/97X03X25.TXT>
<http://www.byegm.gov.tr/YAYINLARIMIZ/CHR/ING98/03/98X03X02.HTM>
<http://www.byegm.gov.tr/YAYINLARIMIZ/CHR/ING99/10/99X10X26.HTM#%2016>
<http://www.byegm.gov.tr/YAYINLARIMIZ/CHR/ING2000/03/00X03X06.HTM#%2021>
<http://www.byegm.gov.tr/YAYINLARIMIZ/CHR/ING2001/03/23x03x01.HTM#%2027>
From Paul Eggert (2007-01-03):
Prefer the above source to Shanks & Pottenger for time stamps after 1990.

From Steffen Thorsen (2007-03-09):
Starting 2007 though, it seems that they are adopting EU's 1:00 UTC
start/end time, according to the following page (2007-03-07):
<http://www.ntvmsnbc.com/news/402029.asp>
The official document is located here - it is in Turkish...:
<http://rega.basbakanlik.gov.tr/eskiler/2007/03/20070307-7.htm>
I was able to locate
the following seemingly official document
(on a non-government server though) describing dates between 2002 and 2006:
http://www.alomaliye.com/bkk_2002_3769.htm

From Gökdeniz Karadağ; (2011-03-10):

According to the articles linked below, Turkey will change into summer
time zone (GMT+3) on March 28, 2011 at 3:00 a.m. instead of March 27.
This change is due to a nationwide exam on 27th.

<http://www.worldbulletin.net/?aType=haber&ArticleID=70872>
<http://www.worldbulletin.net/?aType=haber&ArticleID=70872>

Turkish:
<http://www.hurriyet.com.tr/ekonomi/17230464.asp?gid=373>
<http://www.hurriyet.com.tr/ekonomi/17230464.asp?gid=373>
#

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule Turkey 1916 only - May 1 0:00 1:00 S

Rule Turkey 1916 only - Oct 1 0:00 0 -

Rule Turkey 1920 only - Mar 28 0:00 1:00 S

Rule Turkey 1920 only - Oct 25 0:00 0 -

Rule Turkey 1921 only - Apr 3 0:00 1:00 S

Rule Turkey 1921 only - Oct 3 0:00 0 -

Rule Turkey 1922 only - Mar 26 0:00 1:00 S

Rule Turkey 1922 only - Oct

8 0:00 0 -

Whitman gives 1923 Apr 28 - Sep 16 and no DST in 1924-1925;

go with Shanks & Pottenger.

Rule Turkey 1924 only - May 13 0:00 1:00 S

Rule Turkey 1924 1925 - Oct 1 0:00 0 -

Rule Turkey 1925 only - May 1 0:00 1:00 S

Rule Turkey 1940 only - Jun 30 0:00 1:00 S

Rule Turkey 1940 only - Oct 5 0:00 0 -

Rule Turkey 1940 only - Dec 1 0:00 1:00 S

Rule Turkey 1941 only - Sep 21 0:00 0 -

Rule Turkey 1942 only - Apr 1 0:00 1:00 S

Whitman omits the next two transition and gives 1945 Oct 1;

go with Shanks & Pottenger.

Rule Turkey 1942 only - Nov 1 0:00 0 -

Rule Turkey 1945 only - Apr 2 0:00 1:00 S

Rule Turkey 1945 only - Oct 8 0:00 0 -

Rule Turkey 1946 only - Jun 1 0:00 1:00 S

Rule Turkey 1946 only - Oct 1 0:00 0 -

Rule Turkey 1947 1948 - Apr Sun>=16 0:00 1:00 S

Rule Turkey 1947 1950 - Oct Sun>=2 0:00 0 -

Rule Turkey 1949 only - Apr 10 0:00 1:00 S

Rule Turkey 1950 only - Apr 19 0:00 1:00 S

Rule Turkey 1951 only - Apr 22 0:00 1:00 S

Rule Turkey 1951 only - Oct

8 0:00 0 -

Rule Turkey 1962 only - Jul 15 0:00 1:00 S

Rule Turkey 1962 only - Oct 8 0:00 0 -

Rule Turkey 1964 only - May 15 0:00 1:00 S

Rule Turkey 1964 only - Oct 1 0:00 0 -

Rule Turkey 1970 1972 - May Sun>=2 0:00 1:00 S

Rule Turkey 1970 1972 - Oct Sun>=2 0:00 0 -

Rule Turkey 1973 only - Jun 3 1:00 1:00 S

Rule Turkey 1973 only - Nov 4 3:00 0 -

Rule Turkey 1974 only - Mar 31 2:00 1:00 S

Rule Turkey 1974 only - Nov 3 5:00 0 -

Rule Turkey 1975 only - Mar 30 0:00 1:00 S

Rule Turkey 1975 1976 - Oct lastSun 0:00 0 -

Rule Turkey 1976 only - Jun 1 0:00 1:00 S

Rule Turkey 1977 1978 - Apr Sun>=1 0:00 1:00 S

Rule Turkey 1977 only - Oct 16 0:00 0 -

Rule Turkey 1979 1980 - Apr Sun>=1 3:00 1:00 S

Rule Turkey 1979 1982 - Oct Mon>=11 0:00 0 -

Rule Turkey 1981 1982 - Mar lastSun 3:00 1:00 S

Rule Turkey 1983 only - Jul 31 0:00 1:00 S

Rule Turkey 1983 only - Oct 2 0:00 0 -

Rule Turkey 1985 only - Apr 20 0:00 1:00 S

Rule Turkey 1985 only - Sep 28 0:00 0 -

Rule Turkey 1986 1990 - Mar lastSun 2:00s 1:00 S

Rule Turkey 1986 1990 - Sep lastSun 2:00s 0 -
 Rule Turkey 1991 2006 - Mar lastSun 1:00s 1:00 S
 Rule Turkey 1991 1995 - Sep lastSun 1:00s 0 -
 Rule Turkey 1996 2006 - Oct lastSun 1:00s 0 -
 #
 Zone NAME GMTTOFF RULES FORMAT [UNTIL]
 Zone Europe/Istanbul 1:55:52 - LMT 1880
 1:56:56 - IMT 1910 Oct # Istanbul Mean Time?
 2:00 Turkey EE%sT 1978 Oct 15
 3:00 Turkey TR%sT 1985 Apr 20 # Turkey Time
 2:00 Turkey EE%sT 2007
 2:00 EU EE%sT 2011 Mar 27 1:00u
 2:00 - EET 2011 Mar 28 1:00u
 2:00 EU EE%sT
 Link Europe/Istanbul Asia/Istanbul # Istanbul is in both continents.

 # Ukraine
 #
 # From Igor Karpov, who works for the Ukrainian Ministry of Justice,
 # via Garrett Wollman (2003-01-27):
 # BTW, I've found the official document on this matter. It's government
 # regulations number 509, May 13, 1996. In my poor translation it says:
 # "Time in Ukraine is set to second timezone (Kiev time). Each last Sunday
 # of March at 3am the time
 is changing to 4am and each last Sunday of
 # October the time at 4am is changing to 3am"

 # From Alexander Krivenyshev (2011-09-20):
 # On September 20, 2011 the deputies of the Verkhovna Rada agreed to
 # abolish the transfer clock to winter time.
 #
 # Bill number 8330 of MP from the Party of Regions Oleg Nadoshi got
 # approval from 266 deputies.
 #
 # Ukraine abolishes transfer back to the winter time (in Russian)
 #
 # http://news.mail.ru/politics/6861560/
 #
 #
 # The Ukrainians will no longer change the clock (in Russian)
 #
 # http://www.segodnya.ua/news/14290482.html
 #
 #
 # Deputies cancelled the winter time (in Russian)
 #
 # http://www.pravda.com.ua/rus/news/2011/09/20/6600616/
 #

From Philip Pizzey (2011-10-18):
Today my Ukrainian colleagues have informed me that the
Ukrainian parliament have decided that
they will go to winter
time this year after all.

From Udo Schwedt (2011-10-18):
As far as I understand, the recent change to the Ukrainian time zone
(Europe/Kiev) to introduce permanent daylight saving time (similar
to Russia) was reverted today:

http://portal.rada.gov.ua/rada/control/en/publish/article/info_left?art_id=287324&cat_id=105995

Also reported by Alexander Bokovoy (2011-10-18) who also noted:
The law documents themselves are at

http://w1.c1.rada.gov.ua/pls/zweb_n/webproc4_1?id=&pf3511=41484

Zone NAME GMTOFF RULES FORMAT [UNTIL]
Most of Ukraine since 1970 has been like Kiev.
"Kyiv" is the transliteration of the Ukrainian name, but
"Kiev" is more common in English.

Zone Europe/Kiev 2:02:04 - LMT 1880
2:02:04 - KMT 1924 May 2 # Kiev Mean Time
2:00 - EET 1930

Jun 21
3:00 - MSK 1941 Sep 20
1:00 C-Eur CE%sT 1943 Nov 6
3:00 Russia MSK/MSD 1990
3:00 - MSK 1990 Jul 1 2:00
2:00 - EET 1992
2:00 E-Eur EE%sT 1995
2:00 EU EE%sT

Ruthenia used CET 1990/1991.
"Uzhhorod" is the transliteration of the Ukrainian name, but
"Uzhgorod" is more common in English.

Zone Europe/Uzhgorod 1:29:12 - LMT 1890 Oct
1:00 - CET 1940
1:00 C-Eur CE%sT 1944 Oct
1:00 1:00 CEST 1944 Oct 26
1:00 - CET 1945 Jun 29
3:00 Russia MSK/MSD 1990

3:00 - MSK 1990 Jul 1 2:00
 1:00 - CET 1991 Mar 31 3:00
 2:00 - EET 1992
 2:00 E-Eur EE%ST 1995
 2:00 EU EE%ST
 # Zaporozh'ye and eastern Lugansk oblasts observed DST 1990/1991.
 # "Zaporizhia" is the transliteration of the Ukrainian name, but
 # "Zaporozh'ye" is more common in English. Use the common English
 # spelling, except omit the apostrophe as it is not allowed in
 # portable Posix file names.
 Zone Europe/Zaporozhye 2:20:40 - LMT 1880
 2:20 - CUT 1924 May 2 #
 Central Ukraine T
 2:00 - EET 1930 Jun 21
 3:00 - MSK 1941 Aug 25
 1:00 C-Eur CE%ST 1943 Oct 25
 3:00 Russia MSK/MSD 1991 Mar 31 2:00
 2:00 E-Eur EE%ST 1995
 2:00 EU EE%ST
 # Central Crimea used Moscow time 1994/1997.
 Zone Europe/Simferopol 2:16:24 - LMT 1880
 2:16 - SMT 1924 May 2 # Simferopol Mean T
 2:00 - EET 1930 Jun 21
 3:00 - MSK 1941 Nov
 1:00 C-Eur CE%ST 1944 Apr 13
 3:00 Russia MSK/MSD 1990
 3:00 - MSK 1990 Jul 1 2:00
 2:00 - EET 1992
 # From Paul Eggert (2006-03-22):
 # The _Economist_ (1994-05-28, p 45) reports that central Crimea switched
 # from Kiev to Moscow time sometime after the January 1994 elections.
 # Shanks (1999) says ``date of change uncertain'', but implies that it happened
 # sometime between the 1994 DST switches. Shanks & Pottenger simply say
 # 1994-09-25 03:00, but that can't be right. For now, guess it
 # changed in May.
 2:00 E-Eur EE%ST 1994 May
 # From IATA SSIM (1994/1997), which also says that Kerch is still like Kiev.
 3:00 E-Eur MSK/MSD 1996
 Mar 31 3:00s
 3:00 1:00 MSD 1996 Oct 27 3:00s
 # IATA SSIM (1997-09) says Crimea switched to EET/EEST.
 # Assume it happened in March by not changing the clocks.
 3:00 Russia MSK/MSD 1997
 3:00 - MSK 1997 Mar lastSun 1:00u
 2:00 EU EE%ST

 #####

One source shows that Bulgaria, Cyprus, Finland, and Greece observe DST from
the last Sunday in March to the last Sunday in September in 1986.
The source shows Romania changing a day later than everybody else.

According to Bernard Sieloff's source, Poland is in the MET time zone but
uses the WE DST rules. The Western USSR uses EET+1 and ME DST rules.
Bernard Sieloff's source claims Romania switches on the same day, but at
00:00 standard time (i.e., 01:00 DST). It also claims that Turkey
switches on the same day, but switches on at 01:00 standard time
and off at 00:00 standard time (i.e., 01:00 DST)

...

Date: Wed, 28 Jan

87 16:56:27 -0100

From: Tom Hofmann

...

#

...the European time rules are...standardized since 1981, when
most European coun[tr]ies started DST. Before that year, only
a few countries (UK, France, Italy) had DST, each according
to own national rules. In 1981, however, DST started on
'Apr firstSun', and not on 'Mar lastSun' as in the following
years...

But also since 1981 there are some more national exceptions
than listed in 'europe': Switzerland, for example, joined DST
one year later, Denmark ended DST on 'Oct 1' instead of 'Sep
lastSun' in 1981---I don't know how they handle now.

#

Finally, DST ist always from 'Apr 1' to 'Oct 1' in the
Soviet Union (as far as I know).

#

Tom Hofmann, Scientific Computer Center, CIBA-GEIGY AG,
4002 Basle, Switzerland

...

...

Date: Wed, 4 Feb 87 22:35:22 +0100

From: Dik T. Winter

...

#

The information from Tom Hofmann is (as far as I know) not entirely correct.
After a request from chongo at amdahl I tried
to retrieve all information

about DST in Europe. I was able to find all from about 1969.

#

...standardization on DST in Europe started in about 1977 with switches on
first Sunday in April and last Sunday in September...

In 1981 UK joined Europe insofar that

```
# the starting day for both shifted to last Sunday in March. And from 1982
# the whole of Europe used DST, with switch dates April 1 and October 1 in
# the Sov[i]et Union. In 1985 the SU reverted to standard Europe[a]n switch
# dates...
#
# It should also be remembered that time-zones are not constants; e.g.
# Portugal switched in 1976 from MET (or CET) to WET with DST...
# Note also that though there were rules for switch dates not
# all countries abided to these dates, and many individual deviations
# occurred, though not since 1982 I believe. Another note: it is always
# assumed that DST is 1 hour ahead of normal time, this need not be the
# case; at least in the Netherlands there have been times when DST was 2 hours
#
# in advance of normal time.
#
# ...
# dik t. winter, cwi, amsterdam, nederland
# ...
```

```
# From Bob Devine (1988-01-28):
# ...
# Greece: Last Sunday in April to last Sunday in September (iffy on dates).
# Since 1978. Change at midnight.
# ...
# Monaco: has same DST as France.
# ...
```

Found in path(s):

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/europe
No license file was found, but licenses were detected in source scan.
```

```
# <pre>
```

```
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.
```

```
# Allowance for leapseconds added to each timezone file.
```

```
# The International Earth Rotation Service periodically uses leap seconds
# to keep UTC to within 0.9 s of UT1
# (which measures the true angular orientation of the earth in space); see
# Terry J Quinn, The BIPM and the accurate measure of time,
# Proc IEEE 79, 7 (July 1991), 894-905.
# There were no leap seconds before 1972, because the official mechanism
# accounting for the discrepancy between atomic time and the earth's rotation
# did not exist until the early 1970s.
```

```
# The correction (+ or -) is made at the given time, so lines
```


will typically look like:

Leap YEAR MON DAY 23:59:60 + R/S

or

Leap YEAR MON DAY 23:59:59 - R/S

If the leapsecond is Rolling (R) the given time is local time

If the leapsecond is Stationary (S) the given time is UTC

Leap YEAR MONTH DAY HH:MM:SS CORR R/S

Leap 1972 Jun 30 23:59:60 + S

Leap 1972 Dec 31 23:59:60 + S

Leap 1973 Dec 31 23:59:60 + S

Leap 1974 Dec 31 23:59:60 + S

Leap 1975 Dec 31 23:59:60 + S

Leap 1976 Dec 31 23:59:60 + S

Leap 1977 Dec 31 23:59:60 + S

Leap 1978 Dec 31 23:59:60 + S

Leap 1979 Dec 31 23:59:60 + S

Leap 1981 Jun 30 23:59:60 + S

Leap 1982 Jun 30 23:59:60 + S

Leap 1983 Jun 30 23:59:60 + S

Leap 1985 Jun 30 23:59:60 + S

Leap 1987 Dec 31 23:59:60 + S

Leap 1989 Dec 31 23:59:60 + S

Leap 1990 Dec 31 23:59:60 + S

Leap 1992 Jun 30 23:59:60 + S

Leap 1993 Jun 30 23:59:60 + S

Leap 1994 Jun 30 23:59:60 + S

Leap 1995 Dec 31 23:59:60 + S

Leap 1997 Jun 30 23:59:60 + S

Leap 1998 Dec 31 23:59:60 + S

Leap 2005 Dec 31 23:59:60 + S

Leap 2008 Dec 31 23:59:60 + S

Leap 2012 Jun 30 23:59:60 + S

#

INTERNATIONAL EARTH ROTATION AND REFERENCE SYSTEMS SERVICE (IERS)

#

SERVICE INTERNATIONAL DE LA ROTATION TERRESTRE ET DES SYSTEMES DE REFERENCE

#

#

SERVICE DE LA ROTATION TERRESTRE

OBSERVATOIRE DE PARIS

#

61, Av. de l'Observatoire 75014 PARIS (France)

Tel. : 33 (0) 1 40 51 22 26

FAX : 33 (0) 1 40 51 22 91

e-mail : (E-Mail Removed)

```

# http://hpiers.obspm.fr/eop-pc
#
# Paris, 5 January 2012
#
#
# Bulletin C 43
#
# To authorities responsible
# for the measurement and
# distribution of time
#
#
# UTC TIME STEP
# on the 1st of July 2012
#
#
# A positive leap second will be introduced at the end of June 2012.
# The sequence of dates of the UTC second markers will be:
#
#           2012 June 30,  23h 59m 59s
#           2012 June 30,  23h 59m 60s
#           2012 July  1,   0h  0m  0s
#
# The difference between UTC and the International Atomic Time TAI is:
#
# from 2009 January 1, 0h UTC, to 2012 July 1  0h UTC : UTC-TAI = - 34s
# from 2012 July 1,   0h UTC, until further notice  : UTC-TAI = - 35s
#
# Leap seconds can be introduced in UTC at the end of the months of December
# or June, depending on the evolution of UT1-TAI.
# Bulletin C is mailed every
# six months, either to announce a time step in UTC or to confirm that there
# will be no time step at the next possible date.
#
#
# Daniel GAMBIS
# Head
# Earth Orientation Center of IERS
# Observatoire de Paris, France

Found in path(s):
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/leapseconds
No license file was found, but licenses were detected in source scan.

# <pre>
# This file is in the public domain, so clarified as of
# 2009-05-17 by Arthur David Olson.

```

```
# Old rules, should the need arise.
# No attempt is made to handle Newfoundland, since it cannot be expressed
# using the System V "TZ" scheme (half-hour offset), or anything outside
# North America (no support for non-standard DST start/end dates), nor
# the changes in the DST rules in the US after 1976 (which occurred after
# the old rules were written).
#
# If you need the old rules, uncomment ## lines.
# Compile this *without* leap second correction for true conformance.
```

```
# Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S
```

```
Rule SystemV min 1973 - Apr lastSun 2:00 1:00 D
```

```
Rule SystemV min 1973 - Oct lastSun 2:00 0 S
```

```
Rule SystemV 1974 only - Jan 6 2:00 1:00 D
```

```
Rule SystemV 1974 only - Nov lastSun 2:00 0 S
```

```
Rule SystemV 1975 only - Feb 23 2:00 1:00 D
```

```
Rule SystemV 1975 only - Oct lastSun 2:00 0 S
```

```
Rule SystemV 1976 max - Apr lastSun 2:00 1:00 D
```

```
Rule SystemV 1976 max - Oct lastSun 2:00 0 S
```

```
#
```

```
Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]
```

```
## Zone SystemV/AST4ADT -4:00 SystemV A%sT
```

```
## Zone SystemV/EST5EDT -5:00 SystemV E%sT
```

```
## Zone SystemV/CST6CDT -6:00 SystemV C%sT
```

```
## Zone SystemV/MST7MDT -7:00 SystemV M%sT
```

```
## Zone SystemV/PST8PDT -8:00 SystemV P%sT
```

```
## Zone SystemV/YST9YDT -9:00 SystemV Y%sT
```

```
## Zone SystemV/AST4 -4:00 - AST
```

```
## Zone SystemV/EST5 -5:00 - EST
```

```
## Zone SystemV/CST6 -6:00 - CST
```

```
## Zone SystemV/MST7 -7:00 - MST
```

```
## Zone SystemV/PST8 -8:00 - PST
```

```
## Zone SystemV/YST9 -9:00 - YST
```

```
## Zone SystemV/HST10 -10:00 - HST
```

```
Found in path(s):
```

```
* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/systemv
```

```
No license file was found, but licenses were detected in source scan.
```

```
/*
```

```
* Copyright 2001-2006 Sun Microsystems, Inc. All Rights Reserved.
```

```
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
```

```
*
```

```
* This code is free software; you can redistribute it and/or modify it
```

```
* under the terms of the GNU General Public License version 2 only, as
```

* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided
* by Sun in the LICENSE file that accompanied this code.
*
* This code is distributed in the hope that it will be useful, but WITHOUT
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
* version 2 for more details (a copy is included in the LICENSE file that
* accompanied this code).
*
* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to
the Free Software Foundation,
* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.
*
* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,
* CA 95054 USA or visit www.sun.com if you need additional information or
* have any questions.
*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/tools/javazic/GenDoc.java
No license file was found, but licenses were detected in source scan.

/*

** Copyright (c) 1989 The Regents of the University of California.
** All rights reserved.
**
** Redistribution and use in source and binary forms are permitted
** provided that the above copyright notice and this paragraph are
** duplicated in all such forms and that any documentation,
** advertising materials, and other materials related to such
** distribution and use acknowledge that the software was developed
** by the University of California, Berkeley. The name of the
** University may not be used to endorse or promote products derived
** from this software without specific prior written permission.
** THIS SOFTWARE IS PROVIDED ``AS IS" AND WITHOUT ANY EXPRESS OR
** IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED
** WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-
2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/strftime.c
No license file was found, but licenses were detected in source scan.

/*

** This file is in the public domain, so clarified as of

** 2006-07-17 by Arthur David Olson.

*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/scheck.c

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/zic.c

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/ialloc.c

No license file was found, but licenses were detected in source scan.

.\" All rights reserved.

.\" Redistribution and use in source and binary forms, with or without

.\" modification, are permitted provided that the following conditions

.\" are met:

.\" 1. Redistributions of source code must retain the above copyright

.\" notice, this list of conditions and the following disclaimer.

.\" 2. Redistributions in binary form must reproduce the above copyright

.\" notice, this list of conditions and the following disclaimer in the

.\" documentation and/or other materials provided with the distribution.

.\" 3. All advertising materials mentioning features or use of this software

.\" 4. Neither the name of the University nor the names of its contributors

.\" without specific prior written permission.

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/newstrftime.3

No license file was found, but licenses were detected in source scan.

<pre>

This file is in the public domain, so clarified as of

2009-05-17 by Arthur David Olson.

Apparent noon times below are for Riyadh; they're a bit off for other places.

Times were computed using a formula provided by the U. S. Naval Observatory:

eqt = -105.8 * sin(l) + 596.2 * sin(2 * l) + 4.4 * sin(3 * l)

-12.7 * sin(4 * l) - 429.0 * cos(l) - 2.1 * cos (2 * l)

+ 19.3 * cos(3 * l);

where l is the "mean longitude of the Sun" given by

l = 279.642 degrees + 0.985647 * d

and d is the interval in days from January 0, 0 hours Universal Time

(equaling the day of the year plus the fraction of a day from zero hours).

The accuracy of the formula is plus or minus three seconds.

#

Rounding to the nearest five seconds results in fewer than

256 different "time types"--a limit that's faced because time types are

stored on disk as unsigned chars.

Rule NAME FROM TO TYPE IN ON AT SAVE LETTER/S

Rule sol89 1989 only - Jan 1 12:03:35s

-0:03:35 -

Rule sol89 1989 only - Jan 2 12:04:05s -0:04:05 -

Rule sol89 1989 only - Jan 3 12:04:30s -0:04:30 -

Rule sol89 1989 only - Jan 4 12:05:00s -0:05:00 -

Rule sol89 1989 only - Jan 5 12:05:25s -0:05:25 -

Rule sol89 1989 only - Jan 6 12:05:50s -0:05:50 -

Rule sol89 1989 only - Jan 7 12:06:15s -0:06:15 -

Rule sol89 1989 only - Jan 8 12:06:45s -0:06:45 -

Rule sol89 1989 only - Jan 9 12:07:10s -0:07:10 -

Rule sol89 1989 only - Jan 10 12:07:35s -0:07:35 -

Rule sol89 1989 only - Jan 11 12:07:55s -0:07:55 -

Rule sol89 1989 only - Jan 12 12:08:20s -0:08:20 -

Rule sol89 1989 only - Jan 13 12:08:45s -0:08:45 -

Rule sol89 1989 only - Jan 14 12:09:05s -0:09:05 -

Rule sol89 1989 only - Jan 15 12:09:25s -0:09:25 -

Rule sol89 1989 only - Jan 16 12:09:45s -0:09:45 -

Rule sol89 1989 only - Jan 17 12:10:05s -0:10:05 -

Rule sol89 1989 only - Jan 18 12:10:25s -0:10:25 -

Rule sol89 1989 only - Jan 19 12:10:45s -0:10:45 -

Rule sol89 1989 only - Jan 20 12:11:05s

-0:11:05 -

Rule sol89 1989 only - Jan 21 12:11:20s -0:11:20 -

Rule sol89 1989 only - Jan 22 12:11:35s -0:11:35 -

Rule sol89 1989 only - Jan 23 12:11:55s -0:11:55 -

Rule sol89 1989 only - Jan 24 12:12:10s -0:12:10 -

Rule sol89 1989 only - Jan 25 12:12:20s -0:12:20 -

Rule sol89 1989 only - Jan 26 12:12:35s -0:12:35 -

Rule sol89 1989 only - Jan 27 12:12:50s -0:12:50 -

Rule sol89 1989 only - Jan 28 12:13:00s -0:13:00 -

Rule sol89 1989 only - Jan 29 12:13:10s -0:13:10 -

Rule sol89 1989 only - Jan 30 12:13:20s -0:13:20 -

Rule sol89 1989 only - Jan 31 12:13:30s -0:13:30 -

Rule sol89 1989 only - Feb 1 12:13:40s -0:13:40 -

Rule sol89 1989 only - Feb 2 12:13:45s -0:13:45 -

Rule sol89 1989 only - Feb 3 12:13:55s -0:13:55 -

Rule sol89 1989 only - Feb 4 12:14:00s -0:14:00 -

Rule sol89 1989 only - Feb 5 12:14:05s -0:14:05 -

Rule sol89 1989 only - Feb 6 12:14:10s -0:14:10 -

Rule sol89 1989 only - Feb 7 12:14:10s -0:14:10 -

Rule sol89 1989 only - Feb 8 12:14:15s -0:14:15 -

Rule sol89 1989 only - Feb 9 12:14:15s

-0:14:15 -

Rule sol89 1989 only - Feb 10 12:14:20s -0:14:20 -

Rule sol89 1989 only - Feb 11 12:14:20s -0:14:20 -

Rule sol89 1989 only - Feb 12 12:14:20s -0:14:20 -
Rule sol89 1989 only - Feb 13 12:14:15s -0:14:15 -
Rule sol89 1989 only - Feb 14 12:14:15s -0:14:15 -
Rule sol89 1989 only - Feb 15 12:14:10s -0:14:10 -
Rule sol89 1989 only - Feb 16 12:14:10s -0:14:10 -
Rule sol89 1989 only - Feb 17 12:14:05s -0:14:05 -
Rule sol89 1989 only - Feb 18 12:14:00s -0:14:00 -
Rule sol89 1989 only - Feb 19 12:13:55s -0:13:55 -
Rule sol89 1989 only - Feb 20 12:13:50s -0:13:50 -
Rule sol89 1989 only - Feb 21 12:13:40s -0:13:40 -
Rule sol89 1989 only - Feb 22 12:13:35s -0:13:35 -
Rule sol89 1989 only - Feb 23 12:13:25s -0:13:25 -
Rule sol89 1989 only - Feb 24 12:13:15s -0:13:15 -
Rule sol89 1989 only - Feb 25 12:13:05s -0:13:05 -
Rule sol89 1989 only - Feb 26 12:12:55s -0:12:55 -
Rule sol89 1989 only - Feb 27 12:12:45s -0:12:45 -
Rule sol89 1989 only - Feb 28 12:12:35s -0:12:35 -
Rule sol89 1989 only - Mar 1 12:12:25s
-0:12:25 -
Rule sol89 1989 only - Mar 2 12:12:10s -0:12:10 -
Rule sol89 1989 only - Mar 3 12:12:00s -0:12:00 -
Rule sol89 1989 only - Mar 4 12:11:45s -0:11:45 -
Rule sol89 1989 only - Mar 5 12:11:35s -0:11:35 -
Rule sol89 1989 only - Mar 6 12:11:20s -0:11:20 -
Rule sol89 1989 only - Mar 7 12:11:05s -0:11:05 -
Rule sol89 1989 only - Mar 8 12:10:50s -0:10:50 -
Rule sol89 1989 only - Mar 9 12:10:35s -0:10:35 -
Rule sol89 1989 only - Mar 10 12:10:20s -0:10:20 -
Rule sol89 1989 only - Mar 11 12:10:05s -0:10:05 -
Rule sol89 1989 only - Mar 12 12:09:50s -0:09:50 -
Rule sol89 1989 only - Mar 13 12:09:30s -0:09:30 -
Rule sol89 1989 only - Mar 14 12:09:15s -0:09:15 -
Rule sol89 1989 only - Mar 15 12:09:00s -0:09:00 -
Rule sol89 1989 only - Mar 16 12:08:40s -0:08:40 -
Rule sol89 1989 only - Mar 17 12:08:25s -0:08:25 -
Rule sol89 1989 only - Mar 18 12:08:05s -0:08:05 -
Rule sol89 1989 only - Mar 19 12:07:50s -0:07:50 -
Rule sol89 1989 only - Mar 20 12:07:30s -0:07:30
-
Rule sol89 1989 only - Mar 21 12:07:15s -0:07:15 -
Rule sol89 1989 only - Mar 22 12:06:55s -0:06:55 -
Rule sol89 1989 only - Mar 23 12:06:35s -0:06:35 -
Rule sol89 1989 only - Mar 24 12:06:20s -0:06:20 -
Rule sol89 1989 only - Mar 25 12:06:00s -0:06:00 -
Rule sol89 1989 only - Mar 26 12:05:40s -0:05:40 -
Rule sol89 1989 only - Mar 27 12:05:25s -0:05:25 -
Rule sol89 1989 only - Mar 28 12:05:05s -0:05:05 -
Rule sol89 1989 only - Mar 29 12:04:50s -0:04:50 -

Rule sol89 1989 only - Mar 30 12:04:30s -0:04:30 -
Rule sol89 1989 only - Mar 31 12:04:10s -0:04:10 -
Rule sol89 1989 only - Apr 1 12:03:55s -0:03:55 -
Rule sol89 1989 only - Apr 2 12:03:35s -0:03:35 -
Rule sol89 1989 only - Apr 3 12:03:20s -0:03:20 -
Rule sol89 1989 only - Apr 4 12:03:00s -0:03:00 -
Rule sol89 1989 only - Apr 5 12:02:45s -0:02:45 -
Rule sol89 1989 only - Apr 6 12:02:25s -0:02:25 -
Rule sol89 1989 only - Apr 7 12:02:10s -0:02:10 -
Rule sol89 1989 only - Apr 8 12:01:50s -0:01:50 -
Rule sol89 1989 only - Apr 9 12:01:35s
-0:01:35 -
Rule sol89 1989 only - Apr 10 12:01:20s -0:01:20 -
Rule sol89 1989 only - Apr 11 12:01:05s -0:01:05 -
Rule sol89 1989 only - Apr 12 12:00:50s -0:00:50 -
Rule sol89 1989 only - Apr 13 12:00:35s -0:00:35 -
Rule sol89 1989 only - Apr 14 12:00:20s -0:00:20 -
Rule sol89 1989 only - Apr 15 12:00:05s -0:00:05 -
Rule sol89 1989 only - Apr 16 11:59:50s 0:00:10 -
Rule sol89 1989 only - Apr 17 11:59:35s 0:00:25 -
Rule sol89 1989 only - Apr 18 11:59:20s 0:00:40 -
Rule sol89 1989 only - Apr 19 11:59:10s 0:00:50 -
Rule sol89 1989 only - Apr 20 11:58:55s 0:01:05 -
Rule sol89 1989 only - Apr 21 11:58:45s 0:01:15 -
Rule sol89 1989 only - Apr 22 11:58:30s 0:01:30 -
Rule sol89 1989 only - Apr 23 11:58:20s 0:01:40 -
Rule sol89 1989 only - Apr 24 11:58:10s 0:01:50 -
Rule sol89 1989 only - Apr 25 11:58:00s 0:02:00 -
Rule sol89 1989 only - Apr 26 11:57:50s 0:02:10 -
Rule sol89 1989 only - Apr 27 11:57:40s 0:02:20 -
Rule sol89 1989 only - Apr 28 11:57:30s 0:02:30 -
Rule sol89 1989 only - Apr 29 11:57:20s
0:02:40 -
Rule sol89 1989 only - Apr 30 11:57:15s 0:02:45 -
Rule sol89 1989 only - May 1 11:57:05s 0:02:55 -
Rule sol89 1989 only - May 2 11:57:00s 0:03:00 -
Rule sol89 1989 only - May 3 11:56:50s 0:03:10 -
Rule sol89 1989 only - May 4 11:56:45s 0:03:15 -
Rule sol89 1989 only - May 5 11:56:40s 0:03:20 -
Rule sol89 1989 only - May 6 11:56:35s 0:03:25 -
Rule sol89 1989 only - May 7 11:56:30s 0:03:30 -
Rule sol89 1989 only - May 8 11:56:30s 0:03:30 -
Rule sol89 1989 only - May 9 11:56:25s 0:03:35 -
Rule sol89 1989 only - May 10 11:56:25s 0:03:35 -
Rule sol89 1989 only - May 11 11:56:20s 0:03:40 -
Rule sol89 1989 only - May 12 11:56:20s 0:03:40 -
Rule sol89 1989 only - May 13 11:56:20s 0:03:40 -
Rule sol89 1989 only - May 14 11:56:20s 0:03:40 -

Rule sol89 1989 only - May 15 11:56:20s 0:03:40 -
Rule sol89 1989 only - May 16 11:56:20s 0:03:40 -
Rule sol89 1989 only - May 17 11:56:20s 0:03:40 -
Rule sol89 1989 only - May 18 11:56:25s 0:03:35 -
Rule sol89 1989 only - May 19 11:56:25s
0:03:35 -
Rule sol89 1989 only - May 20 11:56:30s 0:03:30 -
Rule sol89 1989 only - May 21 11:56:35s 0:03:25 -
Rule sol89 1989 only - May 22 11:56:35s 0:03:25 -
Rule sol89 1989 only - May 23 11:56:40s 0:03:20 -
Rule sol89 1989 only - May 24 11:56:45s 0:03:15 -
Rule sol89 1989 only - May 25 11:56:55s 0:03:05 -
Rule sol89 1989 only - May 26 11:57:00s 0:03:00 -
Rule sol89 1989 only - May 27 11:57:05s 0:02:55 -
Rule sol89 1989 only - May 28 11:57:15s 0:02:45 -
Rule sol89 1989 only - May 29 11:57:20s 0:02:40 -
Rule sol89 1989 only - May 30 11:57:30s 0:02:30 -
Rule sol89 1989 only - May 31 11:57:35s 0:02:25 -
Rule sol89 1989 only - Jun 1 11:57:45s 0:02:15 -
Rule sol89 1989 only - Jun 2 11:57:55s 0:02:05 -
Rule sol89 1989 only - Jun 3 11:58:05s 0:01:55 -
Rule sol89 1989 only - Jun 4 11:58:15s 0:01:45 -
Rule sol89 1989 only - Jun 5 11:58:25s 0:01:35 -
Rule sol89 1989 only - Jun 6 11:58:35s 0:01:25 -
Rule sol89 1989 only - Jun 7 11:58:45s 0:01:15 -
Rule sol89 1989 only - Jun 8 11:59:00s 0:01:00
-
Rule sol89 1989 only - Jun 9 11:59:10s 0:00:50 -
Rule sol89 1989 only - Jun 10 11:59:20s 0:00:40 -
Rule sol89 1989 only - Jun 11 11:59:35s 0:00:25 -
Rule sol89 1989 only - Jun 12 11:59:45s 0:00:15 -
Rule sol89 1989 only - Jun 13 12:00:00s 0:00:00 -
Rule sol89 1989 only - Jun 14 12:00:10s -0:00:10 -
Rule sol89 1989 only - Jun 15 12:00:25s -0:00:25 -
Rule sol89 1989 only - Jun 16 12:00:35s -0:00:35 -
Rule sol89 1989 only - Jun 17 12:00:50s -0:00:50 -
Rule sol89 1989 only - Jun 18 12:01:05s -0:01:05 -
Rule sol89 1989 only - Jun 19 12:01:15s -0:01:15 -
Rule sol89 1989 only - Jun 20 12:01:30s -0:01:30 -
Rule sol89 1989 only - Jun 21 12:01:40s -0:01:40 -
Rule sol89 1989 only - Jun 22 12:01:55s -0:01:55 -
Rule sol89 1989 only - Jun 23 12:02:10s -0:02:10 -
Rule sol89 1989 only - Jun 24 12:02:20s -0:02:20 -
Rule sol89 1989 only - Jun 25 12:02:35s -0:02:35 -
Rule sol89 1989 only - Jun 26 12:02:45s -0:02:45 -
Rule sol89 1989 only - Jun 27 12:03:00s -0:03:00 -
Rule sol89 1989 only - Jun 28 12:03:10s

-0:03:10 -

Rule sol89 1989 only - Jun 29 12:03:25s -0:03:25 -
Rule sol89 1989 only - Jun 30 12:03:35s -0:03:35 -
Rule sol89 1989 only - Jul 1 12:03:45s -0:03:45 -
Rule sol89 1989 only - Jul 2 12:04:00s -0:04:00 -
Rule sol89 1989 only - Jul 3 12:04:10s -0:04:10 -
Rule sol89 1989 only - Jul 4 12:04:20s -0:04:20 -
Rule sol89 1989 only - Jul 5 12:04:30s -0:04:30 -
Rule sol89 1989 only - Jul 6 12:04:40s -0:04:40 -
Rule sol89 1989 only - Jul 7 12:04:50s -0:04:50 -
Rule sol89 1989 only - Jul 8 12:05:00s -0:05:00 -
Rule sol89 1989 only - Jul 9 12:05:10s -0:05:10 -
Rule sol89 1989 only - Jul 10 12:05:20s -0:05:20 -
Rule sol89 1989 only - Jul 11 12:05:25s -0:05:25 -
Rule sol89 1989 only - Jul 12 12:05:35s -0:05:35 -
Rule sol89 1989 only - Jul 13 12:05:40s -0:05:40 -
Rule sol89 1989 only - Jul 14 12:05:50s -0:05:50 -
Rule sol89 1989 only - Jul 15 12:05:55s -0:05:55 -
Rule sol89 1989 only - Jul 16 12:06:00s -0:06:00 -
Rule sol89 1989 only - Jul 17 12:06:05s -0:06:05 -
Rule sol89 1989 only - Jul 18 12:06:10s

-0:06:10 -

Rule sol89 1989 only - Jul 19 12:06:15s -0:06:15 -
Rule sol89 1989 only - Jul 20 12:06:20s -0:06:20 -
Rule sol89 1989 only - Jul 21 12:06:20s -0:06:20 -
Rule sol89 1989 only - Jul 22 12:06:25s -0:06:25 -
Rule sol89 1989 only - Jul 23 12:06:25s -0:06:25 -
Rule sol89 1989 only - Jul 24 12:06:30s -0:06:30 -
Rule sol89 1989 only - Jul 25 12:06:30s -0:06:30 -
Rule sol89 1989 only - Jul 26 12:06:30s -0:06:30 -
Rule sol89 1989 only - Jul 27 12:06:30s -0:06:30 -
Rule sol89 1989 only - Jul 28 12:06:30s -0:06:30 -
Rule sol89 1989 only - Jul 29 12:06:25s -0:06:25 -
Rule sol89 1989 only - Jul 30 12:06:25s -0:06:25 -
Rule sol89 1989 only - Jul 31 12:06:20s -0:06:20 -
Rule sol89 1989 only - Aug 1 12:06:20s -0:06:20 -
Rule sol89 1989 only - Aug 2 12:06:15s -0:06:15 -
Rule sol89 1989 only - Aug 3 12:06:10s -0:06:10 -
Rule sol89 1989 only - Aug 4 12:06:05s -0:06:05 -
Rule sol89 1989 only - Aug 5 12:06:00s -0:06:00 -
Rule sol89 1989 only - Aug 6 12:05:50s -0:05:50 -
Rule sol89 1989 only - Aug 7 12:05:45s

-0:05:45 -

Rule sol89 1989 only - Aug 8 12:05:35s -0:05:35 -
Rule sol89 1989 only - Aug 9 12:05:30s -0:05:30 -
Rule sol89 1989 only - Aug 10 12:05:20s -0:05:20 -
Rule sol89 1989 only - Aug 11 12:05:10s -0:05:10 -
Rule sol89 1989 only - Aug 12 12:05:00s -0:05:00 -

Rule sol89 1989 only - Aug 13 12:04:50s -0:04:50 -
Rule sol89 1989 only - Aug 14 12:04:40s -0:04:40 -
Rule sol89 1989 only - Aug 15 12:04:30s -0:04:30 -
Rule sol89 1989 only - Aug 16 12:04:15s -0:04:15 -
Rule sol89 1989 only - Aug 17 12:04:05s -0:04:05 -
Rule sol89 1989 only - Aug 18 12:03:50s -0:03:50 -
Rule sol89 1989 only - Aug 19 12:03:35s -0:03:35 -
Rule sol89 1989 only - Aug 20 12:03:25s -0:03:25 -
Rule sol89 1989 only - Aug 21 12:03:10s -0:03:10 -
Rule sol89 1989 only - Aug 22 12:02:55s -0:02:55 -
Rule sol89 1989 only - Aug 23 12:02:40s -0:02:40 -
Rule sol89 1989 only - Aug 24 12:02:20s -0:02:20 -
Rule sol89 1989 only - Aug 25 12:02:05s -0:02:05 -
Rule sol89 1989 only - Aug 26 12:01:50s -0:01:50

-

Rule sol89 1989 only - Aug 27 12:01:30s -0:01:30 -
Rule sol89 1989 only - Aug 28 12:01:15s -0:01:15 -
Rule sol89 1989 only - Aug 29 12:00:55s -0:00:55 -
Rule sol89 1989 only - Aug 30 12:00:40s -0:00:40 -
Rule sol89 1989 only - Aug 31 12:00:20s -0:00:20 -
Rule sol89 1989 only - Sep 1 12:00:00s 0:00:00 -
Rule sol89 1989 only - Sep 2 11:59:45s 0:00:15 -
Rule sol89 1989 only - Sep 3 11:59:25s 0:00:35 -
Rule sol89 1989 only - Sep 4 11:59:05s 0:00:55 -
Rule sol89 1989 only - Sep 5 11:58:45s 0:01:15 -
Rule sol89 1989 only - Sep 6 11:58:25s 0:01:35 -
Rule sol89 1989 only - Sep 7 11:58:05s 0:01:55 -
Rule sol89 1989 only - Sep 8 11:57:45s 0:02:15 -
Rule sol89 1989 only - Sep 9 11:57:20s 0:02:40 -
Rule sol89 1989 only - Sep 10 11:57:00s 0:03:00 -
Rule sol89 1989 only - Sep 11 11:56:40s 0:03:20 -
Rule sol89 1989 only - Sep 12 11:56:20s 0:03:40 -
Rule sol89 1989 only - Sep 13 11:56:00s 0:04:00 -
Rule sol89 1989 only - Sep 14 11:55:35s 0:04:25 -
Rule sol89 1989 only - Sep 15 11:55:15s 0:04:45

-

Rule sol89 1989 only - Sep 16 11:54:55s 0:05:05 -
Rule sol89 1989 only - Sep 17 11:54:35s 0:05:25 -
Rule sol89 1989 only - Sep 18 11:54:10s 0:05:50 -
Rule sol89 1989 only - Sep 19 11:53:50s 0:06:10 -
Rule sol89 1989 only - Sep 20 11:53:30s 0:06:30 -
Rule sol89 1989 only - Sep 21 11:53:10s 0:06:50 -
Rule sol89 1989 only - Sep 22 11:52:45s 0:07:15 -
Rule sol89 1989 only - Sep 23 11:52:25s 0:07:35 -
Rule sol89 1989 only - Sep 24 11:52:05s 0:07:55 -
Rule sol89 1989 only - Sep 25 11:51:45s 0:08:15 -
Rule sol89 1989 only - Sep 26 11:51:25s 0:08:35 -
Rule sol89 1989 only - Sep 27 11:51:05s 0:08:55 -

Rule sol89 1989 only - Sep 28 11:50:40s 0:09:20 -
Rule sol89 1989 only - Sep 29 11:50:20s 0:09:40 -
Rule sol89 1989 only - Sep 30 11:50:00s 0:10:00 -
Rule sol89 1989 only - Oct 1 11:49:45s 0:10:15 -
Rule sol89 1989 only - Oct 2 11:49:25s 0:10:35 -
Rule sol89 1989 only - Oct 3 11:49:05s 0:10:55 -
Rule sol89 1989 only - Oct 4 11:48:45s 0:11:15 -
Rule sol89 1989 only - Oct 5 11:48:30s 0:11:30 -
Rule sol89 1989 only - Oct 6 11:48:10s
0:11:50 -
Rule sol89 1989 only - Oct 7 11:47:50s 0:12:10 -
Rule sol89 1989 only - Oct 8 11:47:35s 0:12:25 -
Rule sol89 1989 only - Oct 9 11:47:20s 0:12:40 -
Rule sol89 1989 only - Oct 10 11:47:00s 0:13:00 -
Rule sol89 1989 only - Oct 11 11:46:45s 0:13:15 -
Rule sol89 1989 only - Oct 12 11:46:30s 0:13:30 -
Rule sol89 1989 only - Oct 13 11:46:15s 0:13:45 -
Rule sol89 1989 only - Oct 14 11:46:00s 0:14:00 -
Rule sol89 1989 only - Oct 15 11:45:50s 0:14:10 -
Rule sol89 1989 only - Oct 16 11:45:35s 0:14:25 -
Rule sol89 1989 only - Oct 17 11:45:20s 0:14:40 -
Rule sol89 1989 only - Oct 18 11:45:10s 0:14:50 -
Rule sol89 1989 only - Oct 19 11:45:00s 0:15:00 -
Rule sol89 1989 only - Oct 20 11:44:50s 0:15:10 -
Rule sol89 1989 only - Oct 21 11:44:40s 0:15:20 -
Rule sol89 1989 only - Oct 22 11:44:30s 0:15:30 -
Rule sol89 1989 only - Oct 23 11:44:20s 0:15:40 -
Rule sol89 1989 only - Oct 24 11:44:10s 0:15:50 -
Rule sol89 1989 only - Oct 25 11:44:05s 0:15:55 -
Rule sol89 1989 only - Oct 26 11:44:00s
0:16:00 -
Rule sol89 1989 only - Oct 27 11:43:50s 0:16:10 -
Rule sol89 1989 only - Oct 28 11:43:45s 0:16:15 -
Rule sol89 1989 only - Oct 29 11:43:40s 0:16:20 -
Rule sol89 1989 only - Oct 30 11:43:40s 0:16:20 -
Rule sol89 1989 only - Oct 31 11:43:35s 0:16:25 -
Rule sol89 1989 only - Nov 1 11:43:35s 0:16:25 -
Rule sol89 1989 only - Nov 2 11:43:35s 0:16:25 -
Rule sol89 1989 only - Nov 3 11:43:30s 0:16:30 -
Rule sol89 1989 only - Nov 4 11:43:35s 0:16:25 -
Rule sol89 1989 only - Nov 5 11:43:35s 0:16:25 -
Rule sol89 1989 only - Nov 6 11:43:35s 0:16:25 -
Rule sol89 1989 only - Nov 7 11:43:40s 0:16:20 -
Rule sol89 1989 only - Nov 8 11:43:45s 0:16:15 -
Rule sol89 1989 only - Nov 9 11:43:50s 0:16:10 -
Rule sol89 1989 only - Nov 10 11:43:55s 0:16:05 -
Rule sol89 1989 only - Nov 11 11:44:00s 0:16:00 -
Rule sol89 1989 only - Nov 12 11:44:05s 0:15:55 -

Rule sol89 1989 only - Nov 13 11:44:15s 0:15:45 -
Rule sol89 1989 only - Nov 14 11:44:25s 0:15:35 -
Rule sol89 1989 only - Nov 15 11:44:35s
0:15:25 -
Rule sol89 1989 only - Nov 16 11:44:45s 0:15:15 -
Rule sol89 1989 only - Nov 17 11:44:55s 0:15:05 -
Rule sol89 1989 only - Nov 18 11:45:10s 0:14:50 -
Rule sol89 1989 only - Nov 19 11:45:20s 0:14:40 -
Rule sol89 1989 only - Nov 20 11:45:35s 0:14:25 -
Rule sol89 1989 only - Nov 21 11:45:50s 0:14:10 -
Rule sol89 1989 only - Nov 22 11:46:05s 0:13:55 -
Rule sol89 1989 only - Nov 23 11:46:25s 0:13:35 -
Rule sol89 1989 only - Nov 24 11:46:40s 0:13:20 -
Rule sol89 1989 only - Nov 25 11:47:00s 0:13:00 -
Rule sol89 1989 only - Nov 26 11:47:20s 0:12:40 -
Rule sol89 1989 only - Nov 27 11:47:35s 0:12:25 -
Rule sol89 1989 only - Nov 28 11:47:55s 0:12:05 -
Rule sol89 1989 only - Nov 29 11:48:20s 0:11:40 -
Rule sol89 1989 only - Nov 30 11:48:40s 0:11:20 -
Rule sol89 1989 only - Dec 1 11:49:00s 0:11:00 -
Rule sol89 1989 only - Dec 2 11:49:25s 0:10:35 -
Rule sol89 1989 only - Dec 3 11:49:50s 0:10:10 -
Rule sol89 1989 only - Dec 4 11:50:15s 0:09:45 -
Rule sol89 1989 only - Dec 5 11:50:35s
0:09:25 -
Rule sol89 1989 only - Dec 6 11:51:00s 0:09:00 -
Rule sol89 1989 only - Dec 7 11:51:30s 0:08:30 -
Rule sol89 1989 only - Dec 8 11:51:55s 0:08:05 -
Rule sol89 1989 only - Dec 9 11:52:20s 0:07:40 -
Rule sol89 1989 only - Dec 10 11:52:50s 0:07:10 -
Rule sol89 1989 only - Dec 11 11:53:15s 0:06:45 -
Rule sol89 1989 only - Dec 12 11:53:45s 0:06:15 -
Rule sol89 1989 only - Dec 13 11:54:10s 0:05:50 -
Rule sol89 1989 only - Dec 14 11:54:40s 0:05:20 -
Rule sol89 1989 only - Dec 15 11:55:10s 0:04:50 -
Rule sol89 1989 only - Dec 16 11:55:40s 0:04:20 -
Rule sol89 1989 only - Dec 17 11:56:05s 0:03:55 -
Rule sol89 1989 only - Dec 18 11:56:35s 0:03:25 -
Rule sol89 1989 only - Dec 19 11:57:05s 0:02:55 -
Rule sol89 1989 only - Dec 20 11:57:35s 0:02:25 -
Rule sol89 1989 only - Dec 21 11:58:05s 0:01:55 -
Rule sol89 1989 only - Dec 22 11:58:35s 0:01:25 -
Rule sol89 1989 only - Dec 23 11:59:05s 0:00:55 -
Rule sol89 1989 only - Dec 24 11:59:35s 0:00:25 -
Rule sol89 1989 only - Dec 25 12:00:05s
-0:00:05 -
Rule sol89 1989 only - Dec 26 12:00:35s -0:00:35 -
Rule sol89 1989 only - Dec 27 12:01:05s -0:01:05 -

Rule sol89 1989 only - Dec 28 12:01:35s -0:01:35 -
Rule sol89 1989 only - Dec 29 12:02:00s -0:02:00 -
Rule sol89 1989 only - Dec 30 12:02:30s -0:02:30 -
Rule sol89 1989 only - Dec 31 12:03:00s -0:03:00 -

Riyadh is at about 46 degrees 46 minutes East: 3 hrs, 7 mins, 4 secs
Before and after 1989, we'll operate on local mean solar time.

Zone NAME GMTOFF RULES/SAVE FORMAT [UNTIL]
Zone Asia/Riyadh89 3:07:04 - zzz 1989
3:07:04 sol89 zzz 1990
3:07:04 - zzz
For backward compatibility...
Link Asia/Riyadh89 Mideast/Riyadh89

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzdata2013c.tar.gz-cosi-expand-archive-aNaheQuq/solar89
No license file was found, but licenses were detected in source scan.

/*

** This file is in the public domain, so clarified as of
** 2009-05-17 by Arthur David Olson.
*/

Found in path(s):

* /opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/tzcode2013c.tar.gz-cosi-expand-archive-f06d3C3G/zdump.c
No license file was found, but licenses were detected in source scan.

/*

* Copyright 2000-2003 Sun Microsystems, Inc. All Rights Reserved.
* DO NOT ALTER OR REMOVE COPYRIGHT NOTICES OR THIS FILE HEADER.
*
* This code is free software; you can redistribute it and/or modify it
* under the terms of the GNU General Public License version 2 only, as
* published by the Free Software Foundation. Sun designates this
* particular file as subject to the "Classpath" exception as provided
* by Sun in the LICENSE file that accompanied this code.
*
* This code is distributed in the hope that it will be useful, but WITHOUT
* ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or
* FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License
* version 2 for more details (a copy is included in the LICENSE file that
* accompanied this code).
*
* You should have received a copy of the GNU General Public License version
* 2 along with this work; if not, write to

the Free Software Foundation,

* Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA.

*

* Please contact Sun Microsystems, Inc., 4150 Network Circle, Santa Clara,

* CA 95054 USA or visit www.sun.com if you need additional information or

* have any questions.

*/

Found in path(s):

*/opt/cola/permits/2005422285_1715245619.3924356/0/tzdata-2013c-2.el6-1.src.rpm-cosi-expand-archive-2Ezs8HBR/javazic.tar.gz-cosi-expand-archive-radlwxCg/sun/util/calendar/CalendarDate.java

1.170 python 2.6.6-37.el6_4

1.170.1 Available under license :

Copyright (c) 2002 Jorge Acereda <jacereda@users.sourceforge.net> &

Peter O'Gorman <ogorman@users.sourceforge.net>

Portions may be copyright others, see the AUTHORS file included with this distribution.

Maintained by Peter O'Gorman <ogorman@users.sourceforge.net>

Bug Reports and other queries should go to <ogorman@users.sourceforge.net>

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,

EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

libffi - Copyright (c) 1996-2003 Red Hat, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL CYGNUS SOLUTIONS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

X Window System License - X11R6.4

Copyright (c) 1998 The Open Group

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from The Open Group.

X Window System is a trademark of The Open Group
libffi - Copyright (c) 1996-2008 Red Hat, Inc and others.
See source files for details.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

pybench License

This copyright notice and license applies to all files in the pybench directory of the pybench distribution.

Copyright (c), 1997-2006, Marc-Andre Lemburg (mal@lemburg.com)
Copyright (c), 2000-2006, eGenix.com Software GmbH (info@egenix.com)

All Rights Reserved.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee or royalty is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation or portions thereof, including modifications, that you make.

THE AUTHOR MARC-ANDRE LEMBURG DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION

WITH THE USE OR PERFORMANCE OF THIS SOFTWARE !

Additional Conditions for this Windows binary build

This program is linked with and uses Microsoft Distributable Code, copyrighted by Microsoft Corporation. The Microsoft Distributable Code includes the following files:

msvcr90.dll
msvcp90.dll
msvcm90.dll

If you further distribute programs that include the Microsoft Distributable Code, you must comply with the restrictions on distribution specified by Microsoft. In particular, you must require distributors and external end users to agree to terms that protect the Microsoft Distributable Code at least as much as Microsoft's own requirements for the Distributable Code. See Microsoft's documentation (included in its developer tools and on its website at microsoft.com) for specific details.

Redistribution of the Windows binary build of the Python interpreter complies with this agreement, provided that you do not:

- alter any copyright, trademark or patent notice in Microsoft's Distributable Code;
- use Microsoft's trademarks in your programs' names or in a way that suggests your programs come from or are endorsed by Microsoft;
- distribute Microsoft's Distributable Code to run on a platform other than Microsoft operating systems, run-time technologies or application platforms; or
- include Microsoft Distributable Code in malicious, deceptive or unlawful programs.

These restrictions apply only to the Microsoft Distributable Code as defined above, not to Python itself or any programs running on the Python interpreter. The redistribution of the Python interpreter and libraries is governed by the Python Software License included with this file, or by other licenses as marked.

A. HISTORY OF THE SOFTWARE

=====

Python was created in the early 1990s by Guido van Rossum at Stichting Mathematisch Centrum (CWI, see <http://www.cwi.nl>) in the Netherlands as a successor of a language called ABC. Guido remains Python's principal author, although it includes many contributions from others.

In 1995, Guido continued his work on Python at the Corporation for National Research Initiatives (CNRI, see <http://www.cnri.reston.va.us>) in Reston, Virginia where he released several versions of the software.

In May 2000, Guido and the Python core development team moved to BeOpen.com to form the BeOpen PythonLabs team. In October of the same year, the PythonLabs team moved to Digital Creations (now Zope Corporation, see <http://www.zope.com>). In 2001, the Python Software Foundation (PSF, see <http://www.python.org/psf/>) was formed, a non-profit organization created specifically to own Python-related Intellectual Property. Zope Corporation is a sponsoring member of the PSF.

All Python releases are Open Source (see <http://www.opensource.org> for the Open Source Definition). Historically, most, but not all, Python releases have also been GPL-compatible; the table below summarizes the various releases.

Release	Derived from	Year	Owner	GPL-compatible? (1)
0.9.0 thru 1.2		1991-1995	CWI	yes
1.3 thru 1.5.2	1.2	1995-1999	CNRI	yes
1.6	1.5.2	2000	CNRI	no
2.0	1.6	2000	BeOpen.com	no
1.6.1	1.6	2001	CNRI	yes (2)
2.1	2.0+1.6.1	2001	PSF	no
2.0.1	2.0+1.6.1	2001	PSF	yes
2.1.1	2.1+2.0.1	2001	PSF	yes
2.2	2.1.1	2001	PSF	yes
2.1.2	2.1.1	2002	PSF	yes
2.1.3				
2.1.2	2002	PSF	yes	
2.2.1	2.2	2002	PSF	yes
2.2.2	2.2.1	2002	PSF	yes
2.2.3	2.2.2	2003	PSF	yes
2.3	2.2.2	2002-2003	PSF	yes
2.3.1	2.3	2002-2003	PSF	yes
2.3.2	2.3.1	2002-2003	PSF	yes
2.3.3	2.3.2	2002-2003	PSF	yes
2.3.4	2.3.3	2004	PSF	yes

2.3.5	2.3.4	2005	PSF	yes
2.4	2.3	2004	PSF	yes
2.4.1	2.4	2005	PSF	yes
2.4.2	2.4.1	2005	PSF	yes
2.4.3	2.4.2	2006	PSF	yes
2.4.4	2.4.3	2006	PSF	yes
2.5	2.4	2006	PSF	yes
2.5.1	2.5	2007	PSF	yes
2.5.2	2.5.1	2008	PSF	yes
2.5.3	2.5.2	2008	PSF	yes
2.6	2.5	2008	PSF	yes
2.6.1	2.6	2008	PSF	yes
2.6.2	2.6.1	2009	PSF	yes
2.6.3	2.6.2	2009	PSF	yes
2.6.4	2.6.3	2009	PSF	yes
2.6.5	2.6.4	2010	PSF	yes

Footnotes:

(1) GPL-compatible doesn't mean that we're distributing Python under the GPL. All Python licenses, unlike the GPL, let you distribute a modified version without making your changes open source. The GPL-compatible licenses make it possible to combine Python with other software that is released under the GPL; the others don't.

(2) According to Richard Stallman, 1.6.1 is not GPL-compatible, because its license has a choice of law clause. According to CNRI, however, Stallman's lawyer has told CNRI's lawyer that 1.6.1 is "not incompatible" with the GPL.

Thanks to the many outside volunteers who have worked under Guido's direction to make these releases possible.

B. TERMS AND CONDITIONS FOR ACCESSING OR OTHERWISE USING PYTHON

=====

PYTHON SOFTWARE FOUNDATION LICENSE VERSION 2

1. This LICENSE AGREEMENT is between the Python Software Foundation ("PSF"), and the Individual or Organization ("Licensee") accessing and otherwise using this software ("Python") in source or binary form and its associated documentation.

2. Subject to the terms and conditions of this License Agreement, PSF hereby grants Licensee a nonexclusive, royalty-free, world-wide license to reproduce,

analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use Python alone or in any derivative version, provided, however, that PSF's License Agreement and PSF's notice of copyright, i.e., "Copyright (c) 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008, 2009, 2010 Python Software Foundation; All Rights Reserved" are retained in Python alone or in any derivative version prepared by Licensee.

3. In the event Licensee prepares a derivative work that is based on or incorporates Python or any part thereof, and wants to make the derivative work available to others as provided herein, then Licensee hereby agrees to include in any such work a brief summary of the changes made to Python.

4. PSF is making Python available to Licensee on an "AS IS" basis. PSF MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, PSF MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF PYTHON WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

5. PSF SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF PYTHON FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF MODIFYING, DISTRIBUTING, OR OTHERWISE USING PYTHON, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

6. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

7. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between PSF and Licensee. This License Agreement does not grant permission to use PSF trademarks or trade name in a trademark sense to endorse or promote products or services of Licensee, or any third party.

8. By copying, installing or otherwise using Python, Licensee agrees to be bound by the terms and conditions of this License Agreement.

BEOPEN.COM LICENSE AGREEMENT FOR PYTHON 2.0

BEOPEN PYTHON OPEN SOURCE LICENSE AGREEMENT VERSION 1

1. This LICENSE AGREEMENT is between BeOpen.com ("BeOpen"), having an office at 160 Saratoga Avenue, Santa Clara,

CA 95051, and the Individual or Organization ("Licensee") accessing and otherwise using this software in source or binary form and its associated documentation ("the Software").

2. Subject to the terms and conditions of this BeOpen Python License Agreement, BeOpen hereby grants Licensee a non-exclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use the Software alone or in any derivative version, provided, however, that the BeOpen Python License is retained in the Software, alone or in any derivative version prepared by Licensee.

3. BeOpen is making the Software available to Licensee on an "AS IS" basis. BEOPEN MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, BEOPEN MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF THE SOFTWARE WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

4. BEOPEN SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF THE SOFTWARE FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF USING, MODIFYING OR DISTRIBUTING THE SOFTWARE, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

5. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

6. This License Agreement shall be governed by and interpreted in all respects by the law of the State of California, excluding conflict of law provisions. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between BeOpen and Licensee. This License Agreement does not grant permission to use BeOpen trademarks or trade names in a trademark sense to endorse or promote products or services of Licensee, or any third party. As an exception, the "BeOpen Python" logos available at <http://www.pythonlabs.com/logos.html> may be used according to the permissions granted on that web page.

7. By copying, installing or otherwise using the software, Licensee agrees to be bound by the terms and conditions of this License Agreement.

CNRI LICENSE AGREEMENT FOR PYTHON 1.6.1

1. This LICENSE AGREEMENT is between the Corporation for National Research Initiatives, having an office at 1895 Preston White Drive, Reston, VA 20191 ("CNRI"), and the Individual or Organization ("Licensee") accessing and otherwise using Python 1.6.1 software in source or binary form and its associated documentation.

2. Subject to the terms and conditions of this License Agreement, CNRI hereby grants Licensee a nonexclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use Python 1.6.1 alone or in any derivative version, provided, however, that CNRI's License Agreement and CNRI's notice of copyright, i.e.,

"Copyright (c)

1995-2001 Corporation for National Research Initiatives; All Rights Reserved" are retained in Python 1.6.1 alone or in any derivative version prepared by Licensee. Alternately, in lieu of CNRI's License Agreement, Licensee may substitute the following text (omitting the quotes): "Python 1.6.1 is made available subject to the terms and conditions in CNRI's License Agreement. This Agreement together with Python 1.6.1 may be located on the Internet using the following unique, persistent identifier (known as a handle): 1895.22/1013. This Agreement may also be obtained from a proxy server on the Internet using the following URL: <http://hdl.handle.net/1895.22/1013>".

3. In the event Licensee prepares a derivative work that is based on or incorporates Python 1.6.1 or any part thereof, and wants to make the derivative work available to others as provided herein, then Licensee hereby agrees to include in any such work a brief summary of the changes made to Python 1.6.1.

4. CNRI

is making Python 1.6.1 available to Licensee on an "AS IS" basis. CNRI MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, CNRI MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF PYTHON 1.6.1 WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

5. CNRI SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF PYTHON 1.6.1 FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF MODIFYING, DISTRIBUTING, OR OTHERWISE USING PYTHON 1.6.1, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

6. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

7. This License Agreement shall be governed by the federal

intellectual property law of the United States, including without limitation the federal copyright law, and, to the extent such U.S. federal law does not apply, by the law of the Commonwealth of Virginia, excluding Virginia's conflict of law provisions. Notwithstanding the foregoing, with regard to derivative works based on Python 1.6.1 that incorporate non-separable material that was previously distributed under the GNU General Public License (GPL), the law of the Commonwealth of Virginia shall govern this License Agreement only as to issues arising under or with respect to Paragraphs 4, 5, and 7 of this License Agreement. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between CNRI and Licensee. This License Agreement does not grant permission to use CNRI trademarks or trade name in a trademark sense to endorse or promote products or services of Licensee, or any third party.

8. By clicking on the "ACCEPT" button where indicated, or by copying, installing or otherwise using Python 1.6.1, Licensee agrees to be bound by the terms and conditions of this License Agreement.

ACCEPT

CWI LICENSE
AGREEMENT FOR PYTHON 0.9.0 THROUGH 1.2

Copyright (c) 1991 - 1995, Stichting Mathematisch Centrum Amsterdam, The Netherlands. All rights reserved.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Stichting Mathematisch Centrum or CWI not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

STICHTING MATHEMATISCH CENTRUM DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL STICHTING MATHEMATISCH CENTRUM BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

1.171 polycoreutils 2.0.83-19.30.el6

1.171.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and

you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program
(or a work based on it,
under Section 2) in object code or executable form under the terms of
Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable
source code, which must be distributed under the terms of Sections
1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three
years, to give any third party, for a charge no more than your
cost of physically performing source distribution, a complete
machine-readable copy of the corresponding source code, to be
distributed under the terms of Sections 1 and 2 above on a medium
customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer
to distribute corresponding source code. (This alternative is
allowed only for noncommercial distribution and only if you
received the program
in object code or executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for
making modifications to it. For an executable work, complete source
code means all the source code for all modules it contains, plus any
associated interface definition files, plus the scripts used to
control compilation and installation of the executable. However, as a
special exception, the source code distributed need not include
anything that is normally distributed (in either source or binary
form) with the major components (compiler, kernel, and so on) of the
operating system on which the executable runs, unless that component
itself accompanies the executable.

If distribution of executable or object code is made by offering
access to copy from a designated place, then offering equivalent
access to copy the source code from the same place counts as
distribution of the source code, even though third parties are not
compelled
to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program
except as expressly provided under this License. Any attempt
otherwise to copy, modify, sublicense or distribute the Program is
void, and will automatically terminate your rights under this License.
However, parties who have received copies, or rights, from you under
this License will not have their licenses terminated so long as such
parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute

software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands

`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.172 util-linux 2.17.2-12.9.el6_4.3

1.172.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to

using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work

which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide

a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code

or executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy
the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version

number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands

`show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
```

```
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute

and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such

parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through

any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c'
should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to
using it. (Some other Free Software Foundation software is covered by
the GNU Library General Public License instead.) You can apply it to
your programs, too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses are designed

to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it,

either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to

control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent

license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

/*

* Copyright (c) 1989 The Regents of the University of California.

* All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software

* must display the following acknowledgement:

* This product includes software developed by the University of

* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

* may be used to endorse or promote products derived from this software

*

without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS "AS IS" AND

* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE

* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS

* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT

* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY

* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF

* SUCH DAMAGE.

*/

/*

* Copyright (c) 2000-2001 Gunnar Ritter. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. [deleted]

* 4. Neither the name of Gunnar Ritter nor the names of his contributors

* may be used to endorse or promote products derived from this software

* without specific prior written permission.

*
* THIS SOFTWARE IS PROVIDED BY GUNNAR RITTER AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR
A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL GUNNAR RITTER OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*/

1.173 gmp 4.3.1-7.el6_2.2

1.173.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for
software and other kinds of works.

The licenses for most software and other practical works are designed
to take away your freedom to share and change the works. By contrast,
the GNU General Public License is intended to guarantee your freedom to
share and change all versions of a program--to make sure it remains free
software for all its users. We, the Free Software Foundation, use the
GNU General Public License for most of our software; it applies also to
any other work released this way by its authors. You can apply it to
your programs, too.

When we speak of free software, we are referring to
freedom, not
price. Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
them if you wish), that you receive source code or can get it if you
want it, that you can change the software or use pieces of it in new
free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that

is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains

in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the

terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product

(including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a

typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the

entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains

a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work

occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant

patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory

patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the

GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

GNU LESSER GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

This version of the GNU Lesser General Public License incorporates the terms and conditions of version 3 of the GNU General Public License, supplemented by the additional permissions listed below.

0. Additional Definitions.

As used herein, "this License" refers to version 3 of the GNU Lesser General Public License, and the "GNU GPL" refers to version 3 of the GNU General Public License.

"The Library" refers to a covered work governed by this License, other than an Application or a Combined Work as defined below.

An "Application" is any work that makes use of an interface provided by the Library, but which is not otherwise based on the Library. Defining a subclass of a class defined by the Library is deemed a mode of using an interface provided by the Library.

A "Combined Work" is a work produced by combining or linking an Application with the Library. The particular version of the Library with which the Combined Work was made is also called the "Linked Version".

The "Minimal Corresponding Source" for a Combined Work means the Corresponding Source for the Combined Work, excluding any source code for portions of the Combined Work that, considered in isolation, are based on the Application, and not on the Linked Version.

The "Corresponding Application Code" for a Combined Work means the object code and/or source code for the Application, including any data and utility programs needed for reproducing the Combined Work from the

Application, but excluding the System Libraries of the Combined Work.

1. Exception to Section 3 of the GNU GPL.

You may convey a covered work under sections 3 and 4 of this License without being bound by section 3 of the GNU GPL.

2. Conveying
Modified Versions.

If you modify a copy of the Library, and, in your modifications, a facility refers to a function or data to be supplied by an Application that uses the facility (other than as an argument passed when the facility is invoked), then you may convey a copy of the modified version:

- a) under this License, provided that you make a good faith effort to ensure that, in the event an Application does not supply the function or data, the facility still operates, and performs whatever part of its purpose remains meaningful, or
- b) under the GNU GPL, with none of the additional permissions of this License applicable to that copy.

3. Object Code Incorporating Material from Library Header Files.

The object code form of an Application may incorporate material from a header file that is part of the Library. You may convey such object code under terms of your choice, provided that, if the incorporated material is not limited to numerical parameters, data structure layouts and accessors, or small macros, inline functions and templates (ten or fewer lines in length), you do both of the following:

- a) Give prominent notice with each copy of the object code that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the object code with a copy of the GNU GPL and this license document.

4. Combined Works.

You may convey a Combined Work under terms of your choice that, taken together, effectively do not restrict modification of the portions of the Library contained in the Combined Work and reverse engineering for debugging such modifications, if you also do each of the following:

- a) Give prominent notice with each copy of the Combined Work that the Library is used in it and that the Library and its use are covered by this License.

- b) Accompany the Combined Work with a copy of the GNU GPL and this license document.

- c) For a Combined Work that displays copyright notices during execution, include the copyright notice for the Library among these notices, as well as a reference directing the user to the copies of the GNU GPL and this license document.

- d) Do one of the following:
 - 0) Convey the Minimal Corresponding Source under the terms of this License, and the Corresponding Application Code in a form suitable for, and under terms that permit, the user to recombine or relink the Application with a modified version of the Linked Version to produce a modified Combined Work, in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.

 - 1) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (a) uses at run time a copy of the Library already present on the user's computer system, and (b) will operate properly with a modified version of the Library that is interface-compatible with the Linked Version.

- e) Provide Installation Information, but only if you would otherwise be required to provide such information under section 6 of the GNU GPL, and only to the extent that such information is necessary to install and execute a modified version of the Combined Work produced by recombining or relinking the Application with a modified version of the Linked Version. (If you use option 4d0, the Installation Information must accompany the Minimal Corresponding Source and Corresponding Application Code. If you use option 4d1, you must provide the Installation Information in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.)

5. Combined Libraries.

You may place library facilities that are a work based on the Library side by side in a single library together with other library

facilities that are not Applications and are not covered by this License, and convey such a combined library under terms of your choice, if you do both of the following:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities, conveyed under the terms of this License.
- b) Give prominent notice with the combined library that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

6. Revised Versions of the GNU Lesser General Public License.

The Free Software Foundation may publish revised and/or new versions of the GNU Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library as you received it specifies that a certain numbered version of the GNU Lesser General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that published version or of any later version published by the Free Software Foundation. If the Library as you received it does not specify a version number of the GNU Lesser General Public License, you may choose any version of the GNU Lesser General Public License ever published by the Free Software Foundation.

If the Library as you received it specifies that a proxy can decide whether future versions of the GNU Lesser General Public License shall apply, that proxy's public statement of acceptance of any version is permanent authorization for you to choose that version for the Library.

1.174 tpm-tools 1.3.4-2.el6

1.174.1 Available under license :

Common Public License Version 1.0

THE ACCOMPANYING PROGRAM IS PROVIDED UNDER THE TERMS OF THIS COMMON PUBLIC LICENSE ("AGREEMENT"). ANY USE, REPRODUCTION OR DISTRIBUTION OF THE PROGRAM CONSTITUTES RECIPIENT'S ACCEPTANCE OF THIS AGREEMENT.

1. DEFINITIONS

"Contribution" means:

a) in the case of the initial Contributor, the initial code and documentation distributed under this Agreement, and

b) in the case of each subsequent Contributor:

i) changes to the Program, and

ii) additions to the Program;

where such changes and/or additions to the Program originate from and are distributed by that particular Contributor. A Contribution 'originates' from a Contributor if it was added to the Program by such Contributor itself or anyone acting on such Contributor's behalf. Contributions do not include additions to the Program which: (i) are separate modules of software distributed in conjunction with the Program under their own license agreement, and (ii) are not derivative works of the Program.

"Contributor" means any person or entity that distributes the Program.

"Licensed Patents " mean patent claims licensable by a Contributor which are necessarily infringed by the use or sale of its Contribution alone or when combined with the Program.

"Program" means the Contributions distributed in accordance with this Agreement.

"Recipient" means anyone who receives the Program under this Agreement, including all Contributors.

2. GRANT OF RIGHTS

a) Subject to the terms of this Agreement, each Contributor hereby grants Recipient a non-exclusive, worldwide, royalty-free copyright license to reproduce, prepare derivative works of, publicly display, publicly perform, distribute and sublicense the Contribution of such Contributor, if any, and such derivative works, in source code and object code form.

b) Subject to the terms of this Agreement, each Contributor hereby grants Recipient a non-exclusive, worldwide, royalty-free patent license under Licensed Patents

to make, use, sell, offer to sell, import and otherwise transfer the Contribution of such Contributor, if any, in source code and object code form. This patent license shall apply to the combination of the Contribution and the Program if, at the time the Contribution is added by the Contributor, such addition of the Contribution causes such combination to be covered by the

Licensed Patents. The patent license shall not apply to any other combinations which include the Contribution. No hardware per se is licensed hereunder.

c) Recipient understands that although each Contributor grants the licenses to its Contributions set forth herein, no assurances are provided by any Contributor that the Program does not infringe the patent or other intellectual property rights of any other entity. Each Contributor disclaims any liability to Recipient for claims brought by any other entity based on infringement of intellectual property rights or otherwise. As a condition to exercising the rights and licenses granted hereunder, each Recipient hereby assumes sole responsibility to secure any other intellectual property rights needed, if any. For example, if a third party patent license is required to allow Recipient to distribute the Program, it is Recipient's responsibility to acquire that license before distributing the Program.

d) Each Contributor represents that to its knowledge it has sufficient copyright rights in its Contribution, if any, to grant the copyright license set forth in this Agreement.

3. REQUIREMENTS

A Contributor may choose to distribute the Program in object code form under its own license agreement, provided that:

- a) it complies with the terms and conditions of this Agreement; and
- b) its license agreement:
 - i) effectively disclaims on behalf of all Contributors all warranties and conditions, express and implied, including warranties or conditions of title and non-infringement, and implied warranties or conditions of merchantability and fitness for a particular purpose;
 - ii) effectively excludes on behalf of all Contributors all liability for damages, including direct, indirect, special, incidental and consequential damages, such as lost profits;
 - iii) states that any provisions which differ from this Agreement are offered by that Contributor alone and not by any other party; and
 - iv) states that source code for the Program is available from such Contributor, and informs licensees how to obtain it in a reasonable manner on or through a medium customarily used for software exchange.

When the Program is made available in source code form:

- a) it must be made available under this Agreement; and
- b) a copy of this Agreement must be included with each copy of the Program.

Contributors may not remove or alter any copyright notices contained within the Program.

Each Contributor must identify itself as the originator of its Contribution, if any, in a manner that reasonably allows subsequent Recipients to identify the originator of the Contribution.

4. COMMERCIAL DISTRIBUTION

Commercial distributors of software may accept certain responsibilities with respect to end users, business partners and the like. While this license is intended to facilitate the commercial use of the Program, the Contributor who includes the Program in a commercial product offering should do so in a manner which does not create potential liability for other Contributors. Therefore, if a Contributor includes the Program in a commercial product offering, such Contributor ("Commercial Contributor") hereby agrees to defend and indemnify every other Contributor ("Indemnified Contributor") against any losses, damages and costs (collectively "Losses") arising from claims, lawsuits and other legal actions brought by a third party against the Indemnified Contributor to the extent caused by the acts or omissions of such Commercial Contributor in connection with its distribution of the Program in a commercial product offering. The obligations in this section do not apply to any claims or Losses relating to any actual or alleged intellectual property infringement. In order to qualify, an Indemnified Contributor must: a) promptly notify the Commercial Contributor in writing of such claim, and b) allow the Commercial Contributor to control, and cooperate with the Commercial Contributor in, the defense and any related settlement negotiations. The Indemnified Contributor may participate in any such claim at its own expense.

For example, a Contributor might include the Program in a commercial product offering, Product X. That Contributor is then a Commercial Contributor. If that Commercial Contributor then makes performance claims, or offers warranties related to Product X, those performance claims and warranties are such Commercial Contributor's responsibility alone. Under this section, the Commercial Contributor would have to defend claims against the other Contributors related to those performance claims and warranties, and if a court requires any other Contributor to pay any damages as a result, the Commercial Contributor must pay those damages.

5. NO WARRANTY

EXCEPT AS EXPRESSLY SET FORTH IN THIS AGREEMENT, THE PROGRAM IS PROVIDED ON AN "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, EITHER EXPRESS OR IMPLIED INCLUDING, WITHOUT LIMITATION, ANY WARRANTIES OR CONDITIONS OF TITLE, NON-INFRINGEMENT, MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. Each Recipient is solely responsible for determining the appropriateness of using and distributing the Program and assumes all risks associated with its exercise of rights under this Agreement, including but not limited to the risks and costs of program errors, compliance with applicable laws, damage to or loss of data, programs or equipment, and unavailability or interruption of operations.

6. DISCLAIMER OF LIABILITY

EXCEPT AS EXPRESSLY SET FORTH IN THIS AGREEMENT, NEITHER RECIPIENT NOR ANY CONTRIBUTORS SHALL

HAVE ANY LIABILITY FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING WITHOUT LIMITATION LOST PROFITS), HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OR DISTRIBUTION OF THE PROGRAM OR THE EXERCISE OF ANY RIGHTS GRANTED HEREUNDER, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

7. GENERAL

If any provision of this Agreement is invalid or unenforceable under applicable law, it shall not affect the validity or enforceability of the remainder of the terms of this Agreement, and without further action by the parties hereto, such provision shall be reformed to the minimum extent necessary to make such provision valid and enforceable.

If Recipient institutes patent litigation against a Contributor with respect to a patent applicable to software (including a cross-claim or counterclaim in a lawsuit), then any patent licenses granted by that Contributor to such Recipient under this Agreement shall terminate as of the date such litigation is filed. In addition, if Recipient institutes patent litigation against any entity (including a cross-claim or counterclaim in a lawsuit) alleging that the Program itself (excluding combinations of the Program with other software or hardware) infringes such Recipient's patent(s), then such Recipient's rights granted under Section 2(b) shall terminate as of the date such litigation is filed.

All Recipient's rights under this Agreement shall terminate if it fails to comply with any of the material terms or conditions of this Agreement and does not cure such failure in a reasonable period of time after becoming aware of such noncompliance. If all Recipient's rights under this Agreement terminate, Recipient agrees to cease use and distribution of the Program as soon as reasonably practicable. However, Recipient's obligations under this Agreement and any licenses granted by Recipient

relating to the Program shall continue and survive.

Everyone is permitted to copy and distribute copies of this Agreement, but in order to avoid inconsistency the Agreement is copyrighted and may only be modified in the following manner. The Agreement Steward reserves the right to publish new versions (including revisions) of this Agreement from time to time. No one other than the Agreement Steward has the right to modify this Agreement. IBM is the initial Agreement Steward. IBM may assign the responsibility to serve as the Agreement Steward to a suitable separate entity. Each new version of the Agreement will be given a distinguishing version number. The Program (including Contributions) may always be distributed subject to the version of the Agreement under which it was received. In addition, after a new version of the Agreement is published, Contributor may elect to distribute the Program (including its Contributions) under the new version. Except as expressly stated in Sections 2(a)

and 2(b) above, Recipient receives no rights or licenses to the intellectual property of any Contributor under this Agreement, whether expressly, by implication, estoppel or otherwise. All rights in the Program not expressly granted under this Agreement are reserved.

This Agreement is governed by the laws of the State of New York and the intellectual property laws of the United States of America. No party to this Agreement will bring a legal action under this Agreement more than one year after the cause of action arose. Each party waives its rights to a jury trial in any resulting litigation.

1.175 pykickstart 1.74.10

1.175.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by

the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work

which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide

a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code

or executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy
the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number

of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.176 chkconfig 1.3.49.3-2.el6

1.176.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the

notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt

otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made

generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF

MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.177 pam 1.1.1-13.el6

1.177.1 Available under license :

Unless otherwise *explicitly* stated the following text describes the licensed conditions under which the contents of this Linux-PAM release may be distributed:

Redistribution and use in source and binary forms of Linux-PAM, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain any existing copyright notice, and this entire permission notice in its entirety, including the disclaimer of warranties.

2. Redistributions in binary form must reproduce all prior and current copyright notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of any author may not be used to endorse or promote products derived from this software without their specific prior written permission.

ALTERNATIVELY, this product may be distributed under the terms of the GNU General Public License, in which case the provisions of the GNU GPL are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential conflict between the GNU GPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Unless otherwise *explicitly* stated the following text describes the licensed conditions under which the contents of this libpamc release may be distributed:

Redistribution and use in source and binary forms of libpamc, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain any existing copyright notice, and this entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce all prior and current copyright notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of any author may not be used to endorse or promote products derived from this software without their specific prior

written permission.

ALTERNATIVELY, this product may be distributed under the terms of the GNU Library General Public License (LGPL), in which case the provisions of the GNU LGPL are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential conflict between the GNU LGPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The licensing conditions for each module in this package are detailed in the module source files.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for

this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in

the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program,

and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include

anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution

of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free

programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify

it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.178 python-setuptools 0.6.10-3.el6

1.178.1 Available under license :

Zope Public License (ZPL) Version 2.0

This software is Copyright (c) Zope Corporation (tm) and Contributors. All rights reserved.

This license has been certified as open source. It has also been designated as GPL compatible by the Free Software Foundation (FSF).

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions in source code must retain the above copyright notice, this list of conditions, and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name Zope Corporation (tm) must not be used to endorse or promote products derived from this software without prior written permission from Zope Corporation.
4. The right to distribute this software or to use it for any purpose does not give you the right to use Servicemarks (sm) or Trademarks (tm) of Zope Corporation. Use of them is covered in a separate agreement (see <http://www.zope.com/Marks>).
5. If any files are modified, you must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

Disclaimer

THIS SOFTWARE IS PROVIDED BY ZOPE CORPORATION ``AS IS'' AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN

NO EVENT SHALL ZOPE CORPORATION OR ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

This software consists of contributions made by Zope Corporation and many individuals on behalf of Zope Corporation. Specific attributions are listed in the accompanying credits file.

=====

Contributors

=====

- * Alex Grnholm
- * Alice Bevan-McGregor
- * Arfrever Frehtes Taifersar Arahesis
- * Daniel Stutzbach
- * Hanno Schlichting
- * Jannis Leidel
- * Lennart Regebro
- * Martin von Lwis
- * Philip Jenvey
- * Reinout van Rees
- * Tarek Ziad

If you think your name is missing, please add it (alpha order by first name)

1.179 e2fsprogs 1.41.12-14.el6_4.2

1.179.1 Available under license :

This package was added to the e2fsprogs debian source package by Theodore Ts'o <tytso@mit.edu> on Sat Mar 15 15:33:37 EST 2003

It is part of the main e2fsprogs distribution, which can be found at:

<http://sourceforge.net/projects/e2fsprogs>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright:

Copyright (C) 1999, 2001 by Andries Brouwer
Copyright (C) 1999, 2000, 2003 by Theodore Ts'o

You are free to distribute this software under the terms of the GNU
Lesser (Library) General Public License.

On Debian systems, the complete text of the GNU Lesser (Library)
General Public License can be found in /usr/share/common-licenses/LGPL-2.
This is the Debian GNU/Linux prepackaged version of the static EXT2
file system consistency checker (e2fsck.static). The EXT2 utilities
were written by Theodore Ts'o <tytso@mit.edu> and Remy Card
<card@masi.ibp.fr>.

Sources were obtained from <http://sourceforge.net/projects/e2fsprogs>

Packaging is Copyright (c) 2003-2006 Theodore Ts'o <tytso@mit.edu>
Copyright (c) 1997-2003 Yann Dirson <dirson@debian.org>
Copyright (c) 2001 Alcove <<http://www.alcove.com/>>
Copyright (c) 1997 Klee Dienes
Copyright (c) 1995-1996 Michael Nonweiler <mrn20@cam.ac.uk>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright notice:

This package, the EXT2 filesystem utilities, is protected by the GNU
Public License.

Copyright (c) 1993, 1994, 1995, 1996, 1997, 1998, 1999, 2000,
2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008 by Theodore Ts'o

On Debian GNU systems, the complete text of the GNU General
Public License can be found in `usr/share/common-licenses/GPL-2'.

Index: tdbsa/tdb.c

=====

--- tdbsa.orig/tdb.c

+++ tdbsa/tdb.c

@@ -4,11 +4,11 @@ Rev: 23371

Last Changed Date: 2007-06-06 20:14:06 -0400 (Wed, 06 Jun 2007)

*/

/*

- Unix SMB/CIFS implementation.
- + trivial database library - standalone version

- trivial database library - private includes
-

- Copyright (C) Andrew Tridgell 2005
- + Copyright (C) Andrew Tridgell 1999-2005
- + Copyright (C) Jeremy Allison 2000-2006
- + Copyright (C) Paul 'Rusty' Russell 2000

** NOTE! The following LGPL license applies to the tdb
 ** library. This does NOT imply that all of Samba is released
 EXT2ED is hereby placed under the terms of the GNU General Public License.
 Follows the GNU license.

Gadi Oxman, August 1995

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
 675 Mass Ave, Cambridge, MA 02139, USA
 Everyone is permitted to copy and distribute verbatim copies
 of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
 freedom to share and change it. By contrast, the GNU General Public
 License is intended to guarantee your freedom to share and change free
 software--to make sure the software is free for all its users. This
 General Public License applies to most of the Free Software
 Foundation's software and to any other program whose authors commit to
 using it. (Some other Free Software Foundation software is covered by
 the
 GNU Library General Public License instead.) You can apply it to
 your programs, too.

When we speak of free software, we are referring to freedom, not
 price. Our General Public Licenses are designed to make sure that you
 have the freedom to distribute copies of free software (and charge for
 this service if you wish), that you receive source code or can get it
 if you want it, that you can change the software or use pieces of it
 in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid
 anyone to deny you these rights or to ask you to surrender the rights.
 These restrictions translate to certain responsibilities for you if you
 distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether

gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest

your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not

compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any

patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY

FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY

TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software

Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY;
for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider

it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

This package was added to the e2fsprogs debian source package by Theodore Ts'o <tytso@mit.edu> on Sat Mar 15 15:33:37 EST 2003

It is part of the main e2fsprogs distribution, which can be found at:

<http://sourceforge.net/projects/e2fsprogs>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright:

Copyright (C) 1999, 2000, 2003, 2004 by Theodore Ts'o

Redistribution and use in source and binary forms, with or without

modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT

(INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

This is the Debian GNU/Linux prepackaged version of the EXT2 file system utilities (e2fsck, mke2fs, etc.). The EXT2 utilities were written by Theodore Ts'o <tytso@mit.edu> and Remy Card <card@masi.ibp.fr>.

Sources were obtained from <http://sourceforge.net/projects/e2fsprogs>

Packaging is Copyright (c) 2003-2007 Theodore Ts'o <tytso@mit.edu>

Copyright (c) 1997-2003 Yann Dirson <dirson@debian.org>

Copyright (c) 2001 Alcove <<http://www.alcove.com/>>

Copyright (c) 1997 Klee Dienes

Copyright (c) 1995-1996 Michael Nonweiler <mrn20@cam.ac.uk>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright notice:

This package, the EXT2 filesystem utilities, is protected by the GNU Public License.

Copyright (c) 1993, 1994, 1995, 1996, 1997, 1998, 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008 by Theodore Ts'o

On Debian GNU systems, the complete text of the GNU General Public License can be found in `~/usr/share/common-licenses/GPL-2`. This package, the EXT2 filesystem utilities, are made available under the GNU Public License version 2, with the exception of the `lib/ext2fs` and `lib/e2p` libraries, which are made available under the GNU Library General Public License Version 2, the `lib/uuid` library which is made available under a BSD-style license and the `lib/et` and `lib/ss` libraries which are made available under an MIT-style license. Please see `lib/uuid/COPYING` for more details for the license for the files comprising the `libuuid` library, and the source file headers of the `libet` and `libss` libraries for more information.

The most recent officially distributed version can be found at <http://e2fsprogs.sourceforge.net>. If you need to make a distribution, that's the one you should use. If there is some reason why you'd like a more recent version that is still in ALPHA testing (i.e., either using the "WIP" test distributions or one from the hg or git repository from the development branch, please contact me (tytso@mit.edu)

before you ship. The release schedules for this package are flexible, if you give me enough lead time.

Theodore Ts'o
23-June-2007

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered

only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and

you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access

to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING

WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE

OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name  
of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
```

Gnomovision comes
with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine
library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain

designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2.

You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices

stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify

that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object

file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified

executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these

materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the

source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.
- b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the

Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by

modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise)

that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the

original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE

LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

This is the Debian GNU/Linux prepackaged version of the Common Error Description library. It is currently distributed together with the EXT2 file system utilities, which are otherwise packaged as "e2fsprogs".

This package was put together by Yann Dirson <dirson@debian.org>, from sources obtained from a mirror of:
tsx-11.mit.edu:/pub/linux/packages/ext2fs/

From the original distribution:

Copyright 1987, 1988 by the Student Information Processing Board
of the Massachusetts Institute of Technology

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of M.I.T. and the M.I.T. S.I.P.B. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.
M.I.T. and the M.I.T.

S.I.P.B. make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

This is the Debian GNU/Linux prepackaged version of the EXT2 file system utilities (e2fsck, mke2fs, etc.). The EXT2 utilities were written by Theodore Ts'o <tytso@mit.edu> and Remy Card <card@masi.ibp.fr>.

Sources were obtained from <http://sourceforge.net/projects/e2fsprogs>

Packaging is copyright (c) 2003 Theodore Ts'o <tytso@mit.edu>
copyright (c) 1997-2003 Yann Dirson <dirson@debian.org>
copyright (c) 2001 Alcove <<http://www.alcove.com/>>
copyright (c) 1997 Klee Dienes
copyright (c) 1995-1996 Michael Nonweiler <mrn20@cam.ac.uk>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright notice:

This package, the EXT2 filesystem libraries, are protected by the GNU Public License.

Copyright (c) 1993, 1994, 1995, 1996, 1997, 1998, 1999, 2000,
2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008 by Theodore Ts'o

On Debian GNU systems, the complete text of the GNU General
Public License can be found in `~/usr/share/common-licenses/GPL-2`.
This is the Debian GNU/Linux prepackaged version of the `ss`
command-line interface parsing library. It is currently
distributed together with the EXT2 file system utilities, which are
otherwise packaged as "e2fsprogs".

This package was put together by Yann Dirson <dirson@debian.org>,
from sources obtained from a mirror of:
`tsx-11.mit.edu:/pub/linux/packages/ext2fs/`

From the original distribution:

Copyright 1987, 1988 by the Student Information Processing Board
of the Massachusetts Institute of Technology

Permission to use, copy, modify, and distribute this software
and its documentation for any purpose and without fee is
hereby granted, provided that the above copyright notice
appear in all copies and that both that copyright notice and
this permission notice appear in supporting documentation,
and that the names of M.I.T. and the M.I.T. S.I.P.B. not be
used in advertising or publicity pertaining to distribution
of the software without specific, written prior permission.

M.I.T.

and the M.I.T. S.I.P.B. make no representations about
the suitability of this software for any purpose. It is
provided "as is" without express or implied warranty.

This package was added to the e2fsprogs debian source package by
Theodore Ts'o <tytso@mit.edu> on Fri Dec 14 22:24:35 EST 2007

It is part of the main e2fsprogs distribution, which can be found at:

<http://sourceforge.net/projects/e2fsprogs>

Upstream Author: Theodore Ts'o <tytso@mit.edu>

Copyright:

Copyright (C) 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007 by
Theodore Ts'o

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions

are met:

1. Redistributions of source code must retain the above copyright notice, and the entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, ALL OF WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF NOT ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.180 iconv 2.12

1.180.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some

specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain

designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because
of this blurred distinction, using the ordinary General
Public License for libraries did not effectively promote software
sharing, because most developers did not use the libraries. We
concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference
between a
"work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition,

mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2,

instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the

Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline

functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by

modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in

certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE

LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an

exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to

produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed;

section 10
makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately
publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any
non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all
recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to
"keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from

a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work,

for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions;

the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and

propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a

party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where

the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <<http://www.gnu.org/licenses/>>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

1.181 pcre 7.8

1.181.1 Available under license :

PCRE LICENCE

Please see the file LICENCE in the PCRE distribution for licensing details.

End

PCRE LICENCE

PCRE is a library of functions to support regular expressions whose syntax and semantics are as close as possible to those of the Perl 5 language.

Release 7 of PCRE is distributed under the terms of the "BSD" licence, as specified below. The documentation for PCRE, supplied in the "doc" directory, is distributed under the same terms as the software itself.

The basic library functions are written in C and are freestanding. Also included in the distribution is a set of C++ wrapper functions.

THE BASIC LIBRARY FUNCTIONS

Written by: Philip Hazel
Email local part: ph10
Email domain: cam.ac.uk

University of Cambridge Computing Service,
Cambridge, England.

Copyright (c) 1997-2008 University of Cambridge
All rights reserved.

THE C++ WRAPPER FUNCTIONS

Contributed by: Google Inc.

Copyright (c) 2007-2008, Google Inc.
All rights reserved.

THE "BSD" LICENCE

Redistribution and

use in source and binary forms, with or without

modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * Neither the name of the University of Cambridge nor the name of Google Inc. nor the names of their contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

End

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT

NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.182 libpciaccess 0.13.1-2.el6

1.182.1 Available under license :

(C) Copyright IBM Corporation 2006, 2007

(C) Copyright Eric Anholt 2006

Copyright (c) 2007, 2008, 2009, 2011, Oracle and/or its affiliates.

Copyright 2009 Red Hat, Inc.

All Rights Reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation on the rights to use, copy, modify, merge, publish, distribute, sub license, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice (including the next paragraph) shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL IBM AND/OR THEIR SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright (c) 2008 Juan Romero Pardines

Copyright (c) 2008 Mark Kettenis

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND THE AUTHOR DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF

MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright (C) 2000 The XFree86 Project, Inc. All Rights Reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT.

IN NO EVENT SHALL THE XFREE86 PROJECT BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the XFree86 Project shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the XFree86 Project.

1.183 ethtool 3.5-1.el6

1.183.1 Available under license :

ethtool is available under the terms of the GNU Public License version 2.

See COPYING for details.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any

patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole

or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete

machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each

time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates

the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.184 bash 4.1.2-15.el6_4

1.184.1 Available under license :

From friedman@cli.com Thu May 25 12:19:06 1995
Flags: 10
Return-Path: friedman@cli.com
Received: from po.cwru.edu (root@po.CWRU.Edu [129.22.4.2]) by odin.INS.CWRU.Edu with ESMTP (8.6.10+cwru/CWRU-2.1-ins)
id MAA08685; Thu, 25 May 1995 12:19:05 -0400 (from friedman@cli.com for <chet@odin.INS.CWRU.Edu>)
Received: from cli.com (cli.com [192.31.85.1]) by po.cwru.edu with SMTP (8.6.10+cwru/CWRU-2.3)
id MAA11299; Thu, 25 May 1995 12:19:00 -0400 (from friedman@cli.com for <chet@po.cwru.edu>)
Received: from tepui.cli.com by cli.com (4.1/SMI-4.1)
id AA27213; Thu, 25 May 95 11:18:25 CDT
Received: by tepui.cli.com (4.1) id AA16031; Thu, 25 May 95 11:18:23 CDT
Message-Id: <9505251618.AA16031@tepui.cli.com>
From: friedman@gnu.ai.mit.edu (Noah Friedman)
To: chet@po.cwru.edu
Subject: Bash scripts
Reply-To: friedman@gnu.ai.mit.edu
In-Reply-To: <chet@odin.ins.cwru.edu> Thu, 25 May 1995 11:19:59 -0400
References: <9505251519.AA06424.SM@odin.INS.CWRU.Edu>
Date: Thu, 25 May 95 11:18:21 CST

>Hi. I snagged
some of your bash functions from your home directory on
>the FSF machines (naughty, I know), and I was wondering if you'd let
>me distribute them with bash-2.0. Thanks.

Sure. I think there's a later copy in
~ftp/friedman/shell-inits/init-4.89.tar.gz. There are also some elisp and
es frobs in that file.

It should serve as a pretty good example of how to get carried away. :-)

From spcecdt@armory.com Wed May 10 10:21:11 1995

Flags: 10

Return-Path: spcecdt@armory.com

Received: from po.cwru.edu (root@po.CWRU.Edu [129.22.4.2]) by odin.INS.CWRU.Edu with ESMTTP

(8.6.10+cwru/CWRU-2.1-ins)

id KAA22876; Wed, 10 May 1995 10:21:10 -0400 (from spcecdt@armory.com for <chet@odin.INS.CWRU.Edu>)

Received: from deepthought.armory.com (mmdf@deepthought.armory.com [192.122.209.42]) by po.cwru.edu with SMTP (8.6.10+cwru/CWRU-2.3)

id BAA16354; Wed, 10 May 1995 01:33:22 -0400 (from spcecdt@armory.com for <chet@po.cwru.edu>)

From: John DuBois <spcecdt@armory.com>

Date: Tue, 9 May 1995 22:33:12 -0700

In-Reply-To: Chet Ramey <chet@odin.ins.cwru.edu>

"ksh scripts" (May 9, 1:36pm)

X-Www: <http://www.armory.com/~spcecdt/>

X-Mailer: Mail User's Shell (7.2.5 10/14/92)

To: chet@po.cwru.edu

Subject: Re: ksh scripts

Message-ID: <9505092233.aa13001@deepthought.armory.com>

Sure. The canonical versions are available on ftp.armory.com; you might want to pick up the latest versions before modifying them.

John

On May 9, 1:36pm, Chet Ramey wrote:

```
} Subject: ksh scripts
} From odin.ins.cwru.edu!chet Tue May 9 10:39:51 1995
} Received: from odin.INS.CWRU.Edu by deepthought.armory.com id aa22336;
} 9 May 95 10:39 PDT
} Received: (chet@localhost) by odin.INS.CWRU.Edu (8.6.10+cwru/CWRU-2.1-ins)
} id NAA20487; Tue, 9 May 1995 13:39:24 -0400 (from chet)
} Date: Tue, 9 May 1995 13:36:54 -0400
} From: Chet Ramey <chet@odin.ins.cwru.edu>
} To: john@armory.com
} Subject: ksh scripts
} Cc: chet@odin.ins.cwru.edu
} Reply-To: chet@po.cwru.edu
} Message-ID: <9505091736.AA20411.SM@odin.INS.CWRU.Edu>
} Read-Receipt-To: chet@po.CWRU.Edu
} MIME-Version: 1.0
} Content-Type: text/plain; charset=us-ascii
} Status: OR
}
} Hi. I'm the maintainer of bash (the GNU `Bourne Again shell') for
} the FSF.
```

```
}
} I picked up a tar file of ksh scripts you wrote from an anon FTP site
} a while back. I'd like your permission to include modified versions
} of some of them in
the next major bash distribution (with proper credit
} given, of course). Is it OK if I do that?
}
} Chet Ramey
}
} --
} ``The lyf so short, the craft so long to lerne." - Chaucer
}
} Chet Ramey, Case Western Reserve University Internet: chet@po.CWRU.Edu
}-- End of excerpt from Chet Ramey
```

GNU Free Documentation License
Version 1.3, 3 November 2008

Copyright (C) 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.
<<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

0. PREAMBLE

The purpose of this License is to make a manual, textbook, or other
functional and useful document "free" in the sense of freedom: to
assure everyone the effective freedom to copy and redistribute it,
with or without modifying it, either commercially or noncommercially.
Secondarily, this License preserves for the author and publisher a way
to get credit for their work, while not being considered responsible
for modifications made by others.

This License is a kind of "copyleft", which means that derivative
works of the document must themselves be free in the same sense. It
complements the GNU General Public License, which is a copyleft
license designed for free software.

We

have designed this License in order to use it for manuals for free
software, because free software needs free documentation: a free
program should come with manuals providing the same freedoms that the
software does. But this License is not limited to software manuals;
it can be used for any textual work, regardless of subject matter or
whether it is published as a printed book. We recommend this License
principally for works whose purpose is instruction or reference.

1. APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The "Document", below, refers to any such manual or work. Any member of the public is a licensee, and is addressed as "you". You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A "Modified Version" of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A "Secondary Section" is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The "Invariant Sections" are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available

drawing editor, and that is suitable for input to text formatters
or
for automatic translation to a variety of formats suitable for input
to text formatters. A copy made in an otherwise Transparent file
format whose markup, or absence of markup, has been arranged to thwart
or discourage subsequent modification by readers is not Transparent.
An image format is not Transparent if used for any substantial amount
of text. A copy that is not "Transparent" is called "Opaque".

Examples of suitable formats for Transparent copies include plain
ASCII without markup, Texinfo input format, LaTeX input format, SGML
or XML using a publicly available DTD, and standard-conforming simple
HTML, PostScript or PDF designed for human modification. Examples of
transparent image formats include PNG, XCF and JPG. Opaque formats
include proprietary formats that can be read and edited only by
proprietary word processors, SGML or XML for which the DTD and/or
processing tools are not generally available, and the
machine-generated HTML, PostScript or PDF produced by some
word
processors for output purposes only.

The "Title Page" means, for a printed book, the title page itself,
plus such following pages as are needed to hold, legibly, the material
this License requires to appear in the title page. For works in
formats which do not have any title page as such, "Title Page" means
the text near the most prominent appearance of the work's title,
preceding the beginning of the body of the text.

The "publisher" means any person or entity that distributes copies of
the Document to the public.

A section "Entitled XYZ" means a named subunit of the Document whose
title either is precisely XYZ or contains XYZ in parentheses following
text that translates XYZ in another language. (Here XYZ stands for a
specific section name mentioned below, such as "Acknowledgements",
"Dedications", "Endorsements", or "History".) To "Preserve the Title"
of such a section when you modify the Document means that it remains a
section "Entitled XYZ" according to this definition.

The

Document may include Warranty Disclaimers next to the notice which
states that this License applies to the Document. These Warranty
Disclaimers are considered to be included by reference in this
License, but only as regards disclaiming warranties: any other
implication that these Warranty Disclaimers may have is void and has
no effect on the meaning of this License.

2. VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

3. COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition. Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that

edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

4. MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

- A. Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.
- B. List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.
- C. State on the Title page the name of the publisher of the Modified Version, as the publisher.
- D. Preserve all the copyright notices of the Document.
- E. Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.
- F. Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.
- G. Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.
- H. Include an unaltered copy of this License.
- I. Preserve the section Entitled "History", Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled "History" in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

- J. Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the "History" section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.
- K. For any section Entitled "Acknowledgements" or "Dedications", Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.
- L. Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.
- M. Delete any section Entitled "Endorsements". Such a section may not be included in the Modified Version.
- N. Do not retitle any existing section to be Entitled "Endorsements" or to conflict in title with any Invariant Section.
- O. Preserve any Warranty Disclaimers.

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled "Endorsements", provided it contains nothing but endorsements of your Modified Version by various parties--for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

5. COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled "History" in the various original documents, forming one section Entitled "History"; likewise combine any sections Entitled "Acknowledgements", and any sections Entitled "Dedications". You must delete all sections Entitled "Endorsements".

6. COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

7. AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives

with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an "aggregate" if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

8. TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4.

Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled "Acknowledgements", "Dedications", or "History", the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

9. TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

10. FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See <http://www.gnu.org/copyleft/>.

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

11. RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also

provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

"CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

"Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is "eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

Copyright (c) YEAR YOUR NAME.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled "GNU Free Documentation License".

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the "with...Texts." line with this:

with the Invariant Sections being LIST THEIR TITLES, with the Front-Cover Texts being LIST, and with the Back-Cover Texts being LIST.

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the

situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

Unless otherwise stated, all files in this directory are Copyright (C) 1991,1992,1993,1994,1995,1996,1997,1998,1999,2000,2001,2002,2003, 2004,2005,2006,2007,2008,2009
Free Software Foundation, Inc.

The file ifs-posix.tests is Copyright (C) 2005 Glen Fowler.
@c The GNU Free Documentation License.
@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,
@c hence no sectioning command or @node.

@display
Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.
@uref{http://fsf.org/}

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.
@end display

@enumerate 0
@item
PREAMBLE

The purpose of this License is to make a manual, textbook, or other functional and useful document @dfn{free} in the sense of freedom: to assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative works of the document must themselves be free in the same sense. It complements the GNU General Public License, which is a copyleft license designed for free software.

We have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals;

it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The ``Document'', below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as ``you''. You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A ``Modified Version'' of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A ``Secondary Section'' is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The ``Invariant Sections'' are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The ``Cover Texts'' are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A ``Transparent'' copy of the Document means a machine-readable copy,

represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not ``Transparent" is called ``Opaque".

Examples of suitable formats for Transparent copies include plain @sc{ascii} without markup, Texinfo input format, La@TeX{} input format, @acronym{SGML} or @acronym{XML} using a publicly available @acronym{DTD}, and standard-conforming simple @acronym{HTML}, PostScript or @acronym{PDF} designed for human modification. Examples of transparent image formats include @acronym{PNG}, @acronym{XCF} and @acronym{JPG}. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, @acronym{SGML} or @acronym{XML} for which the @acronym{DTD} and/or processing tools are not generally available, and the machine-generated @acronym{HTML}, PostScript or @acronym{PDF} produced by some word processors for output purposes only.

The ``Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, ``Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The ``publisher" means any person or entity that distributes copies of the Document to the public.

A section ``Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as ``Acknowledgements", ``Dedications", ``Endorsements", or ``History".) To ``Preserve the Title" of such a section when you modify the Document means that it remains a section ``Entitled XYZ" according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty

Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever

to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible.

You may add other material on the covers in addition.

Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using

public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material.

If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that

this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements'' or ``Dedications'', Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements''. Such a section

may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements" or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document,

you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements", provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History'' in the various original documents, forming one section Entitled ``History''; likewise combine any sections Entitled ``Acknowledgements'', and any sections Entitled ``Dedications''. You must delete all sections Entitled ``Endorsements.''

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract

a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an ``aggregate'' if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may

be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that

copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See [@uref{http://www.gnu.org/copyleft/}](http://www.gnu.org/copyleft/).

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License ``or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

``Massive Multiauthor Collaboration Site" (or ``MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A ``Massive Multiauthor Collaboration" (or ``MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

``CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license

published by that same organization.

``Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is ``eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

@smallexample

@group

Copyright (C) @var{year} @var{your name}.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled ``GNU Free Documentation License".

@end group

@end smallexample

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the ``with@dots{ }Texts." line with this:

@smallexample

@group

with the Invariant Sections being @var{list their titles}, with the Front-Cover Texts being @var{list}, and with the Back-Cover Texts being @var{list}.

@end group

@end smallexample

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

@c Local Variables:

@c ispell-local-pdict: "ispell-dict"

@c End:

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether

gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this

License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major

Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction

and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

b) The work must carry prominent notices stating that it is

released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the

product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the

additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read

<<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

From mikel@ora.com Tue Aug 1 12:13:20 1995

Flags: 10

Return-Path: mikel@ora.com

Received: from ruby.ora.com (ruby.ora.com [198.112.208.25]) by odin.INS.CWRU.Edu with ESMTP (8.6.12+cwru/CWRU-2.1-ins)

id MAA01565; Tue, 1 Aug 1995 12:13:18 -0400 (from mikel@ora.com for <chet@odin.INS.CWRU.Edu>)

Received: (from fax@localhost) by ruby.ora.com (8.6.12/8.6.11) with UUCP id MAA23251; Tue, 1 Aug 1995 12:07:51 -0400

Received: by los.ora.com (4.1/Spike-2.1)

id AA00672; Tue, 1 Aug 95 08:57:32 EDT

Date: Tue, 1 Aug 95 08:57:32 EDT

From: mikel@ora.com (Michael Loukides)

Message-Id: <9508011257.AA00672@los.ora.com>

Subject: Re: Ksh debugger from Rosenblatt's book [for bash]

To: Chet Ramey <chet@odin.INS.CWRU.Edu>

Cc: cmarie@ora.com, cam@iinet.com.au, brosenblatt@tm.com

In-Reply-To: Chet Ramey <chet@odin.INS.CWRU.Edu>, Mon, 31 Jul 1995 16:22:48 -0400

I've modified a (modified) version of Bill Rosenblatt's ksh debugger to work with bash-2.0. Does ORA have any problem with me distributing

it with bash-2.0?

That's great!

Go ahead and circulate it; in fact, we should probably grab it and stick it in our ftp archive, and put a reference to it in the book. (Too late to actually discuss the thing, at least for this edition).

1.185 nss-softokn 3.14.3-3.el6_4

1.185.1 Available under license :

NSS is available under the Mozilla Public License, version 2, a copy of which is below.

Note on GPL Compatibility

The MPL 2, section 3.3, permits you to combine NSS with code under the GNU General Public License (GPL) version 2, or any later version of that license, to make a Larger Work, and distribute the result under the GPL. The only condition is that you must also make NSS, and any changes you have made to it, available to recipients under the terms of the MPL 2 also.

Anyone who receives the combined code from you does not have to continue

to dual licence in this way, and may, if they wish, distribute under the terms of either of the two licences - either the MPL alone or the GPL alone. However, we discourage people from distributing copies of NSS under the GPL alone, because it means that any improvements they make cannot be reincorporated into the main version of NSS. There is never a need to do this for license compatibility reasons.

Note on LGPL Compatibility

The

above also applies to combining MPLed code in a single library with code under the GNU Lesser General Public License (LGPL) version 2.1, or any later version of that license. If the LGPLed code and the MPLed code are not in the same library, then the copyleft coverage of the two licences does not overlap, so no issues arise.

Mozilla Public License Version 2.0

===== 1. Definitions

----- 1.1. "Contributor"

means each individual or legal entity that creates, contributes to the creation of, or owns Covered Software.

1.2. "Contributor Version"

means the combination of the Contributions of others (if any) used by a Contributor and that particular Contributor's Contribution.

1.3. "Contribution"

means Covered Software of a particular Contributor.

1.4. "Covered Software"

means Source Code Form to which the initial Contributor has attached the notice in Exhibit A, the Executable Form of such Source Code Form, and Modifications of such Source Code Form, in each case including portions thereof.

1.5. "Incompatible With Secondary Licenses"

means

(a) that the initial Contributor has attached the notice described in Exhibit B to the Covered Software; or

(b) that the Covered Software was made available under the terms of version 1.1 or earlier of the License, but not also under the terms of a Secondary License.

1.6. "Executable Form"

means any form of the work other than Source Code Form.

1.7. "Larger Work"

means a work that combines Covered Software with other material, in a separate file or files, that is not Covered Software.

1.8. "License"

means this document.

1.9. "Licensable"

means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently, any and all of the rights conveyed by this License.

1.10. "Modifications"

means any
of the following:

(a) any file in Source Code Form that results from an addition to, deletion from, or modification of the contents of Covered Software; or

(b) any new file in Source Code Form that contains any Covered Software.

1.11. "Patent Claims" of a Contributor

means any patent claim(s), including without limitation, method, process, and apparatus claims, in any patent Licensable by such Contributor that would be infringed, but for the grant of the License, by the making, using, selling, offering for sale, having made, import, or transfer of either its Contributions or its Contributor Version.

1.12. "Secondary License"

means either the GNU General Public License, Version 2.0, the GNU Lesser General Public License, Version 2.1, the GNU Affero General Public License, Version 3.0, or any later versions of those licenses.

1.13. "Source Code Form"

means the form of the work preferred for making modifications.

1.14.

"You" (or "Your")

means an individual or a legal entity exercising rights under this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. License Grants and Conditions

2.1. Grants

Each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license:

- (a) under intellectual property rights (other than patent or trademark) Licensable by such Contributor to use, reproduce, make available, modify, display, perform, distribute, and otherwise exploit its Contributions, either on an unmodified basis, with Modifications, or as part of a Larger Work; and
- (b) under Patent Claims of such Contributor to make, use, sell, offer for sale, have made, import, and otherwise transfer either its Contributions or its Contributor Version.

2.2. Effective Date

The licenses granted in Section 2.1 with respect to any Contribution become effective for each Contribution on the date the Contributor first distributes such Contribution.

2.3. Limitations on Grant Scope

The licenses granted in this Section 2 are the only rights granted under this License. No additional rights or licenses will be implied from the distribution or licensing of Covered Software under this License. Notwithstanding Section 2.1(b) above, no patent license is granted by a Contributor:

- (a) for any code that a Contributor has removed from Covered Software; or
- (b) for infringements caused by: (i) Your and any other third party's modifications of Covered Software, or (ii) the combination of its

Contributions with other software (except as part of its Contributor Version); or

(c) under Patent Claims infringed by Covered Software in the absence of its Contributions.

This License does not grant any rights in the trademarks, service marks, or logos of any Contributor (except as may be necessary to comply with the notice requirements in Section 3.4).

2.4. Subsequent Licenses

No Contributor makes additional grants as a result of Your choice to distribute the Covered Software under a subsequent version of this License (see Section 10.2) or under the terms of a Secondary License (if permitted under the terms of Section 3.3).

2.5. Representation

Each Contributor represents that the Contributor believes its Contributions are its original creation(s) or it has sufficient rights to grant the rights to its Contributions conveyed by this License.

2.6. Fair Use

This License is not intended to limit any rights You have under applicable copyright doctrines of fair use, fair dealing, or other equivalents.

2.7. Conditions

Sections

3.1, 3.2, 3.3, and 3.4 are conditions of the licenses granted in Section 2.1.

3. Responsibilities

3.1. Distribution of Source Form

All distribution of Covered Software in Source Code Form, including any Modifications that You create or to which You contribute, must be under the terms of this License. You must inform recipients that the Source Code Form of the Covered Software is governed by the terms of this License, and how they can obtain a copy of this License. You may not attempt to alter or restrict the recipients' rights in the Source Code Form.

3.2. Distribution of Executable Form

If You distribute Covered Software in Executable Form then:

- (a) such Covered Software must also be made available in Source Code Form, as described in Section 3.1, and You must inform recipients of the Executable Form how they can obtain a copy of such Source Code Form by reasonable means in a timely manner, at a charge no more than the cost of distribution to the recipient; and
- (b) You may distribute such Executable Form under the terms of this License, or sublicense it under different terms, provided that the license for the Executable Form does not attempt to limit or alter the recipients' rights in the Source Code Form under this License.

3.3. Distribution of a Larger Work

You may create and distribute a Larger Work under terms of Your choice, provided that You also comply with the requirements of this License for the Covered Software. If the Larger Work is a combination of Covered Software with a work governed by one or more Secondary Licenses, and the Covered Software is not Incompatible With Secondary Licenses, this License permits You to additionally distribute such Covered Software under the terms of such Secondary License(s), so that the recipient of the Larger Work may, at their option, further distribute the Covered Software under the terms of either this License or such Secondary License(s).

3.4.

Notices

You may not remove or alter the substance of any license notices (including copyright notices, patent notices, disclaimers of warranty, or limitations of liability) contained within the Source Code Form of the Covered Software, except that You may alter any license notices to the extent required to remedy known factual inaccuracies.

3.5. Application of Additional Terms

You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Software. However, You may do so only on Your own behalf, and not on behalf of any Contributor. You must make it absolutely clear that any such warranty, support, indemnity, or liability obligation is offered by You alone, and You hereby agree to indemnify every Contributor for any liability incurred by such Contributor as a result of warranty, support,

indemnity or liability terms You offer. You may include additional disclaimers of warranty and limitations of liability specific to any jurisdiction.

4. Inability to Comply Due to Statute or Regulation

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Software due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be placed in a text file included with all distributions of the Covered Software under this License. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Termination

5.1. The rights granted under this License will terminate automatically if You fail to comply with any of its terms. However, if You become compliant, then the rights granted under this License from a particular Contributor are reinstated (a) provisionally, unless and until such Contributor explicitly and finally terminates Your grants, and (b) on an ongoing basis, if such Contributor fails to notify You of the non-compliance by some reasonable means prior to 60 days after You have come back into compliance. Moreover, Your grants from a particular Contributor are reinstated on an ongoing basis if such Contributor notifies You of the non-compliance by some reasonable means, this is the first time You have received notice of non-compliance with this License from such Contributor, and You become compliant prior to 30 days after Your receipt of the notice.

5.2. If You initiate litigation against any entity by asserting a patent infringement claim (excluding declaratory judgment actions, counter-claims, and cross-claims) alleging that a Contributor Version directly or indirectly infringes any patent, then the rights granted to You by any and all Contributors for the Covered Software under Section 2.1 of this License shall terminate.

5.3. In the event of termination under Sections 5.1 or 5.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or Your distributors under this License prior to termination shall survive termination.

* *
 * 6. Disclaimer of Warranty *
 * ----- *
 * *
 * Covered Software is provided under this License on an "as is" *
 * basis, without warranty of any kind, either expressed, implied, or *
 * statutory, including, without limitation, warranties that the *
 * Covered Software is free of defects, merchantable, fit for a *
 * particular purpose or non-infringing. The entire *
 * risk as to the *
 * quality and performance of the Covered Software is with You. *
 * Should any Covered Software prove defective in any respect, You *
 * (not any Contributor) assume the cost of any necessary servicing, *
 * repair, or correction. This disclaimer of warranty constitutes an *
 * essential part of this License. No use of any Covered Software is *
 * authorized under this License except under this disclaimer. *
 * *

* *
 * 7. Limitation of Liability *
 * ----- *
 * *
 * Under no circumstances *
 * and under no legal theory, whether tort *
 * (including negligence), contract, or otherwise, shall any *
 * Contributor, or anyone who distributes Covered Software as *
 * permitted above, be liable to You for any direct, indirect, *
 * special, incidental, or consequential damages of any character *
 * including, without limitation, damages for lost profits, loss of *
 * goodwill, work stoppage, computer failure or malfunction, or any *
 * and all other commercial damages or losses, even if such party *
 * shall have been informed of the possibility of such damages. This *
 * limitation of liability shall not apply to liability for death or *
 * personal injury resulting from such party's negligence to the *
 * extent applicable law prohibits such limitation. Some *
 * jurisdictions do not allow the exclusion or limitation of *
 * incidental or consequential damages, so this exclusion and *
 * *
 * limitation may not apply to You. *
 * *

8. Litigation

Any litigation relating to this License may be brought only in the courts of a jurisdiction where the defendant maintains its principal place of business and such litigation shall be governed by laws of that jurisdiction, without reference to its conflict-of-law provisions. Nothing in this Section shall prevent a party's ability to bring cross-claims or counter-claims.

9. Miscellaneous

This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not be used to construe this License against a Contributor.

10. Versions of the License

10.1. New Versions

Mozilla Foundation is the license steward. Except as provided in Section 10.3, no one other than the license steward has the right to modify or publish new versions of this License. Each version will be given a distinguishing version number.

10.2. Effect of New Versions

You may distribute the Covered Software under the terms of the version of the License under which You originally received the Covered Software, or under the terms of any subsequent version published by the license steward.

10.3. Modified Versions

If you create software not governed by this License, and you want to create a new license for such software, you may create and use a modified version of this License if you rename the license and remove any references to the name of the license steward (except to note that such modified license differs from this License).

10.4. Distributing

Source Code Form that is Incompatible With Secondary Licenses

If You choose to distribute Source Code Form that is Incompatible With Secondary Licenses under the terms of this version of the License, the notice described in Exhibit B of this License must be attached.

Exhibit A - Source Code Form License Notice

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

If it is not possible or desirable to put the notice in a particular file, then You may include the notice in a location (such as a LICENSE file in a relevant directory) where a recipient would be likely to look for such a notice.

You may add additional accurate notices of copyright ownership.

Exhibit B - "Incompatible With Secondary Licenses" Notice

This Source Code Form is "Incompatible With Secondary Licenses", as defined by the Mozilla Public License, v. 2.0.

***** BEGIN LICENSE BLOCK *****

Version: MPL 1.1/GPL 2.0/LGPL 2.1

The contents of this file are subject to the Mozilla Public License Version 1.1 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <http://www.mozilla.org/MPL/>

Software distributed under the License is distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License for the specific language governing rights and limitations under the License.

The Original Code is the Netscape security libraries.

The Initial Developer of the Original Code is Netscape Communications Corporation. Portions created by Netscape are Copyright (C) 1994-2000 Netscape Communications Corporation. All Rights Reserved.

Contributor(s):

Alternatively, the contents of this file may be used under the terms of either the GNU General Public License Version 2 or later (the "GPL"), or

the GNU Lesser General Public License Version 2.1 or later
(the "LGPL"),
in which case the provisions of the GPL or the LGPL are applicable instead
of those above. If you wish to allow use of your version of this file only
under the terms of either the GPL or the LGPL, and not to allow others to
use your version of this file under the terms of the MPL, indicate your
decision by deleting the provisions above and replace them with the notice
and other provisions required by the GPL or the LGPL. If you do not delete
the provisions above, a recipient may use your version of this file under
the terms of any one of the MPL, the GPL or the LGPL.

***** END LICENSE BLOCK *****

Within this directory, each of the file listed below is licensed under
the terms given in the file LICENSE-MPL, also in this directory.

PRIMES

Within this directory, each of the file listed below is licensed under
the terms given in the file LICENSE-MPL, also in this directory.

basecvt.pod
gcd.pod
invmod.pod
isprime.pod
lap.pod
mpi-test.pod
prime.txt
prng.pod

Within this directory, each of the file listed below is licensed under
the terms given in the file LICENSE-MPL, also in this directory.

pi1k.txt
pi2k.txt
pi5k.txt

1.186 libdrm 2.4.39-1.el6

1.186.1 Available under license :

No license file was found, but licenses were detected in source scan.

/*

- * Copyright 1999 Precision Insight, Inc., Cedar Park, Texas.
- * Copyright 2000 VA Linux Systems, Inc., Sunnyvale, California.
- * All rights reserved.
- *
- * Permission is hereby granted, free of charge, to any person obtaining a
- * copy of this software and associated documentation files (the "Software"),
- * to deal in the Software without restriction, including without limitation

* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* VA LINUX SYSTEMS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
* OTHER DEALINGS IN THE SOFTWARE.
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/drm.h
No license file was found, but licenses were detected in source scan.

/*

* Copyright 2012 Red Hat Inc.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice shall be included in
* all copies or substantial portions of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE COPYRIGHT HOLDER(S) OR AUTHOR(S) BE LIABLE FOR ANY CLAIM, DAMAGES
OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
* OTHER DEALINGS IN THE SOFTWARE.

*

* Authors: Ben Skeggs

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/nouveau/nouveau.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/nouveau/abi16.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/nouveau/pushbuf.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/nouveau/bufctx.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2009 Red Hat Inc.

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining
* a copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
* EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES
* OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND
* NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS, AUTHORS
* AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM,
* OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.

*

* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_cs_space.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright 2011 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation


```

* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* VA LINUX SYSTEMS AND/OR ITS SUPPLIERS
* BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
* OTHER DEALINGS IN THE SOFTWARE.
*/

```

Found in path(s):

```

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
* gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/drm_fourcc.h
No license file was found, but licenses were detected in source scan.

```

```

/* radeon_drm.h -- Public header for the radeon driver -*- linux-c -*-

```

```

*
* Copyright 2000 Precision Insight, Inc., Cedar Park, Texas.
* Copyright 2000 VA Linux Systems, Inc., Fremont, California.
* Copyright 2002 Tungsten Graphics, Inc., Cedar Park, Texas.
* All rights reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS
* PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER

```

* DEALINGS IN THE SOFTWARE.
*
* Authors:
* Kevin E. Martin <martin@valinux.com>
* Gareth Hughes <gareth@valinux.com>
* Keith Whitwell <keith@tungstengraphics.com>
*/

Found in path(s):

*/opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/radeon_drm.h
No license file was found, but licenses were detected in source scan.

/*

* GLX Hardware Device Driver common code
* Copyright (C) 1999 Wittawat Yamwong
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice shall be included
* in all copies or substantial portions of the Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
* OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* KEITH WHITWELL, OR ANY
* OTHER CONTRIBUTORS BE LIABLE FOR ANY CLAIM,
* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR
* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE
* OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.
*/

Found in path(s):

*/opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/mm.h
No license file was found, but licenses were detected in source scan.

/******

*
* Copyright 2007 Red Hat Inc.
* Copyright 2007-2012 Intel Corporation
* Copyright 2006 Tungsten Graphics, Inc., Bismarck, ND., USA
* All Rights Reserved.

```

*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
* THE COPYRIGHT HOLDERS, AUTHORS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM,
* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR
* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.
*
* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.
*
*
*****/

```

```

Found in path(s):
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
* gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_bufmgr_gem.c
No license file was found, but licenses were detected in source scan.

```

```

/*****
*
* Copyright 2006 Tungsten Graphics, Inc., Cedar Park, Texas.
* All Rights Reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:
*
* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
* OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES

```

OF

* MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT.
* IN NO EVENT SHALL TUNGSTEN GRAPHICS AND/OR ITS SUPPLIERS BE LIABLE FOR
* ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT,
* TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE
* SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

*

*****/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_bufmgr_fake.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 2007-2008 Tungsten Graphics, Inc., Cedar Park, Texas.

* Copyright (c) 2007-2008 Jakob Bornecrantz <wallbraker@gmail.com>

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice shall be included in

* all copies or substantial portions of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT.

IN NO EVENT SHALL THE

* AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER

* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING

* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS

* IN THE SOFTWARE.

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/modeprint/modeprint.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright 2000 Gareth Hughes

* Copyright 2002 Frank C. Earl

* Copyright 2002-2003 Leif Delgass

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR
* PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE COPYRIGHT OWNER(S) BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
* WHETHER
* IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN
* CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

*

* Authors:

* Gareth Hughes <gareth@valinux.com>
* Frank C. Earl <fearl@airmail.net>
* Leif Delgass <ldelgass@retinalburn.net>

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
* gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/mach64_drm.h
No license file was found, but licenses were detected in source scan.

/*

*

* Copyright 2006 Tungsten Graphics, Inc., Bismarck, ND. USA.

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,

* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
 * THE COPYRIGHT HOLDERS, AUTHORS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM,
 * DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT
 OR
 * OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
 * USE OR OTHER DEALINGS IN THE SOFTWARE.
 *
 * The above copyright notice and this permission notice (including the
 * next paragraph) shall be included in all copies or substantial portions
 * of the Software.
 *
 */

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/radeon/list.h
 No license file was found, but licenses were detected in source scan.

From 77e3ab9962c13e75c121ba3686a07e441ebf9191 Mon Sep 17 00:00:00 2001
 From: Ben Skeggs <bskeggs@redhat.com>
 Date: Mon, 2 Jul 2012 10:50:45 +1000
 Subject: [PATCH] nouveau: forward-port old nouveau interface to libdrm 2.4.37

For compatibility with current F17, the old interface's pkgconfig data is the same as it was before. If we ever want to update the DDX or Mesa to use the newer interface instead, libdrm_nouveau2 pkgconfig will be needed instead.

v2: renamed libdrm_nouveau_2 to libdrm_nouveau2 as suggested by airlie

```

Makefile.am          |  2 +-
configure.ac         |  4 +-
nouveau-1/Makefile.am      | 43 +++++
nouveau-1/libdrm_nouveau.pc.in | 11 +
nouveau-1/nouveau_bo.c    | 549 +++++++++++++++++++++++++++++++++++++
nouveau-1/nouveau_bo.h    | 104 ++++++++
nouveau-1/nouveau_channel.c | 142 ++++++++
nouveau-1/nouveau_channel.h | 57 +++++
nouveau-1/nouveau_device.c
    | 198 ++++++++
nouveau-1/nouveau_device.h | 33 +++
nouveau-1/nouveau_drmif.h | 58 +++++
nouveau-1/nouveau_grobject.c | 148 ++++++++
nouveau-1/nouveau_grobject.h | 48 +++++
nouveau-1/nouveau_notifier.c | 148 ++++++++
nouveau-1/nouveau_notifier.h | 63 +++++
nouveau-1/nouveau_private.h | 136 ++++++++
nouveau-1/nouveau_pushbuf.c | 344 ++++++++

```

```
nouveau-1/nouveau_pushbuf.h | 162 ++++++++
nouveau-1/nouveau_reloc.c   | 154 ++++++++
nouveau-1/nouveau_reloc.h   | 32 +++
nouveau-1/nouveau_resource.c | 124 ++++++++
nouveau-1/nouveau_resource.h | 51 ++++
nouveau-1/nv04_pushbuf.h     | 66 +++++
nouveau-1/nvc0_pushbuf.h     | 92 ++++++
nouveau/Makefile.am          | 20 +-
nouveau/libdrm_nouveau.pc.in | 11 -
nouveau/libdrm_nouveau2.pc.in | 11 +
27 files changed, 2788 insertions(+), 23 deletions(-)
```

```
create mode 100644 nouveau-1/Makefile.am
create
mode 100644 nouveau-1/libdrm_nouveau.pc.in
create mode 100644 nouveau-1/nouveau_bo.c
create mode 100644 nouveau-1/nouveau_bo.h
create mode 100644 nouveau-1/nouveau_channel.c
create mode 100644 nouveau-1/nouveau_channel.h
create mode 100644 nouveau-1/nouveau_device.c
create mode 100644 nouveau-1/nouveau_device.h
create mode 100644 nouveau-1/nouveau_drmif.h
create mode 100644 nouveau-1/nouveau_grobj.c
create mode 100644 nouveau-1/nouveau_grobj.h
create mode 100644 nouveau-1/nouveau_notifier.c
create mode 100644 nouveau-1/nouveau_notifier.h
create mode 100644 nouveau-1/nouveau_private.h
create mode 100644 nouveau-1/nouveau_pushbuf.c
create mode 100644 nouveau-1/nouveau_pushbuf.h
create mode 100644 nouveau-1/nouveau_reloc.c
create mode 100644 nouveau-1/nouveau_reloc.h
create mode 100644 nouveau-1/nouveau_resource.c
create mode 100644 nouveau-1/nouveau_resource.h
create mode 100644 nouveau-1/nv04_pushbuf.h
create mode 100644 nouveau-1/nvc0_pushbuf.h
delete mode 100644
nouveau/libdrm_nouveau.pc.in
create mode 100644 nouveau/libdrm_nouveau2.pc.in
```

```
diff --git a/Makefile.am b/Makefile.am
index 256a8cc..045add1 100644
--- a/Makefile.am
+++ b/Makefile.am
@@ -34,7 +34,7 @@ INTEL_SUBDIR = intel
endif
```

```
if HAVE_NOUVEAU
-NOUVEAU_SUBDIR = nouveau
+NOUVEAU_SUBDIR = nouveau-1 nouveau
```

```

endif

if HAVE_RADEON
diff --git a/configure.ac b/configure.ac
index a1c8c69..86dd25e 100644
--- a/configure.ac
+++ b/configure.ac
@@ -319,8 +319,10 @@ AC_CONFIG_FILES([
intel/libdrm_intel.pc
radeon/Makefile
radeon/libdrm_radeon.pc
+ nouveau-1/Makefile
+ nouveau-1/libdrm_nouveau.pc
nouveau/Makefile
- nouveau/libdrm_nouveau.pc
+ nouveau/libdrm_nouveau2.pc
omap/Makefile
omap/libdrm_omap.pc
exynos/Makefile
diff --git a/nouveau-1/Makefile.am b/nouveau-1/Makefile.am
new file mode 100644
index 0000000..8b89916
--- /dev/null
+++ b/nouveau-1/Makefile.am
@@ -0,0 +1,43 @@
+AM_CFLAGS = \
+ $(WARN_CFLAGS) \
+ -I$(top_srcdir) \
+ -I$(top_srcdir)/nouveau \
+ $(PTHREADSTUBS_CFLAGS)
\
+ -I$(top_srcdir)/include/drm
+
+libdrm_nouveau_la_LTLIBRARIES = libdrm_nouveau.la
+libdrm_nouveau_ladir = $(libdir)
+libdrm_nouveau_la_LDFLAGS = -version-number 1:0:0 -no-undefined
+libdrm_nouveau_la_LIBADD = ../libdrm.la @PTHREADSTUBS_LIBS@
+
+libdrm_nouveau_la_SOURCES = \
+ nouveau_device.c \
+ nouveau_channel.c \
+ nouveau_pushbuf.c \
+ nouveau_grobj.c \
+ nouveau_notifier.c \
+ nouveau_bo.c \
+ nouveau_resource.c \
+ nouveau_private.h \
+ nouveau_reloc.c

```



```

+
+libdrm_nouveaucommonincludedir = ${includedir}/nouveau
+libdrm_nouveaucommoninclude_HEADERS = \
+ nouveau_device.h \
+ nouveau_channel.h \
+ nouveau_grobject.h \
+ nouveau_notifier.h \
+ nouveau_pushbuf.h \
+ nv04_pushbuf.h \
+ nvc0_pushbuf.h \
+ nouveau_bo.h \
+ nouveau_resource.h \
+ nouveau_reloc.h
+
+
+libdrm_nouveauincludedir = ${includedir}/libdrm
+libdrm_nouveauinclude_HEADERS = \
+ nouveau_drmif.h
+
+pkgconfigdir = @pkgconfigdir@
+pkgconfig_DATA
= libdrm_nouveau.pc
diff --git a/nouveau-1/libdrm_nouveau.pc.in b/nouveau-1/libdrm_nouveau.pc.in
new file mode 100644
index 0000000..c78a28a
--- /dev/null
+++ b/nouveau-1/libdrm_nouveau.pc.in
@@ -0,0 +1,11 @@
+prefix=@prefix@
+exec_prefix=@exec_prefix@
+libdir=@libdir@
+includedir=@includedir@
+
+Name: libdrm_nouveau
+Description: Userspace interface to nouveau kernel DRM services
+Version: 0.6
+Libs: -L${libdir} -ldrm_nouveau
+Cflags: -I${includedir} -I${includedir}/libdrm -I${includedir}/nouveau
+Requires.private: libdrm
diff --git a/nouveau-1/nouveau_bo.c b/nouveau-1/nouveau_bo.c
new file mode 100644
index 0000000..d6bb22d
--- /dev/null
+++ b/nouveau-1/nouveau_bo.c
@@ -0,0 +1,549 @@
+/*
+ * Copyright 2007 Nouveau Project
+ */

```

+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights
to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */

```
+
+#ifdef HAVE_CONFIG_H
+#include <config.h>
+#endif
+#include <stdint.h>
+#include <stdlib.h>
+#include <errno.h>
+#include <assert.h>
+
+#include <sys/mman.h>
+
+#include
"nouveau_private.h"
+
+int
nouveau_bo_init(struct nouveau_device *dev)
+{
+ return 0;
+}
+
+void
nouveau_bo_takedown(struct nouveau_device *dev)
+{
+}
+
+static int
nouveau_bo_info(struct nouveau_bo_priv *nvbo, struct drm_nouveau_gem_info *arg)
+{
+ nvbo->handle = nvbo->base.handle = arg->handle;
```

```

+ nvbo->domain = arg->domain;
+ nvbo->size = arg->size;
+ nvbo->offset = arg->offset;
+ nvbo->map_handle = arg->map_handle;
+ nvbo->base.tile_mode = arg->tile_mode;
+ /* XXX - flag inverted for backwards compatibility */
+ nvbo->base.tile_flags = arg->tile_flags ^ NOUVEAU_GEM_TILE_NONCONTIG;
+ return 0;
+}
+
+static int
+nouveau_bo_allocated(struct nouveau_bo_priv *nvbo)
+{
+ if (nvbo->systemem || nvbo->handle)
+ return 1;
+ return 0;
+}
+
+static int
+nouveau_bo_ualloc(struct nouveau_bo_priv *nvbo)
+{
+ if (nvbo->user || nvbo->systemem) {
+ assert(nvbo->systemem);
+ return 0;
+ }
+
+ nvbo->systemem = malloc(nvbo->size);
+ if (!nvbo->systemem)
+ return -ENOMEM;
+
+ return 0;
+}
+
+static void
+nouveau_bo_ufree(struct
nouveau_bo_priv *nvbo)
+{
+ if (nvbo->systemem) {
+ if (!nvbo->user)
+ free(nvbo->systemem);
+ nvbo->systemem = NULL;
+ }
+}
+
+static void
+nouveau_bo_kfree(struct nouveau_bo_priv *nvbo)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(nvbo->base.device);

```

```

+ struct drm_gem_close req;
+
+ if (!nvbo->handle)
+ return;
+
+ if (nvbo->map) {
+ munmap(nvbo->map, nvbo->size);
+ nvbo->map = NULL;
+ }
+
+ req.handle = nvbo->handle;
+ nvbo->handle = 0;
+ drmIoctl(nvdev->fd, DRM_IOCTL_GEM_CLOSE, &req);
+}
+
+static int
+nouveau_bo_kalloc(struct nouveau_bo_priv *nvbo, struct nouveau_channel *chan)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(nvbo->base.device);
+ struct drm_nouveau_gem_new req;
+ struct drm_nouveau_gem_info *info = &req.info;
+ int ret;
+
+ if (nvbo->handle)
+ return 0;
+
+ req.channel_hint = chan ? chan->id : 0;
+ req.align = nvbo->align;
+
+
+ info->size = nvbo->size;
+ info->domain = 0;
+
+ if (nvbo->flags & NOUVEAU_BO_VRAM)
+ info->domain
+ |= NOUVEAU_GEM_DOMAIN_VRAM;
+ if (nvbo->flags & NOUVEAU_BO_GART)
+ info->domain |= NOUVEAU_GEM_DOMAIN_GART;
+ if (!info->domain) {
+ info->domain |= (NOUVEAU_GEM_DOMAIN_VRAM |
+ NOUVEAU_GEM_DOMAIN_GART);
+ }
+
+ if (nvbo->flags & NOUVEAU_BO_MAP)
+ info->domain |= NOUVEAU_GEM_DOMAIN_MAPPABLE;
+
+ info->tile_mode = nvbo->base.tile_mode;
+ info->tile_flags = nvbo->base.tile_flags;

```

```

+ /* XXX - flag inverted for backwards compatibility */
+ info->tile_flags ^= NOUVEAU_GEM_TILE_NONCONTIG;
+ if (!nvdev->has_bo_usage)
+ info->tile_flags &= NOUVEAU_GEM_TILE_LAYOUT_MASK;
+
+ ret = drmCommandWriteRead(nvdev->fd, DRM_NOUVEAU_GEM_NEW,
+ &req, sizeof(req));
+ if (ret)
+ return ret;
+
+ nouveau_bo_info(nvbo, &req.info);
+ return 0;
+}
+
+static int
+nouveau_bo_kmap(struct nouveau_bo_priv *nvbo)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(nvbo->base.device);
+
+ if (nvbo->map)
+ return 0;
+
+ if (!nvbo->map_handle)
+ return -EINVAL;
+
+ nvbo->map = mmap(0, nvbo->size,
+ PROT_READ | PROT_WRITE,
+ MAP_SHARED, nvdev->fd, nvbo->map_handle);
+ if (nvbo->map == MAP_FAILED) {
+ nvbo->map = NULL;
+ return -errno;
+ }
+
+ return 0;
+}
+
+int
+nouveau_bo_new_tile(struct nouveau_device *dev, uint32_t flags, int align,
+ int size, uint32_t tile_mode, uint32_t tile_flags,
+ struct nouveau_bo **bo)
+{
+ struct nouveau_bo_priv *nvbo;
+ int ret;
+
+ if (!dev || !bo || *bo)
+ return -EINVAL;
+
+ nvbo = calloc(1, sizeof(struct nouveau_bo_priv));

```

```

+ if (!nvbo)
+ return -ENOMEM;
+ nvbo->base.device = dev;
+ nvbo->base.size = size;
+ nvbo->base.tile_mode = tile_mode;
+ nvbo->base.tile_flags = tile_flags;
+
+ nvbo->refcount = 1;
+ nvbo->flags = flags;
+ nvbo->size = size;
+ nvbo->align = align;
+
+ if (flags & (NOUVEAU_BO_VRAM | NOUVEAU_BO_GART)) {
+ ret = nouveau_bo_kalloc(nvbo, NULL);
+ if (ret) {
+ nouveau_bo_ref(NULL, (void *)&nvbo);
+ return ret;
+ }
+ }
+
+ *bo = &nvbo->base;
+ return 0;
+}
+
+int
+nouveau_bo_new(struct nouveau_device *dev,
+ uint32_t flags, int align,
+ int size, struct nouveau_bo **bo)
+{
+ return nouveau_bo_new_tile(dev, flags, align, size, 0, 0, bo);
+}
+
+int
+nouveau_bo_user(struct nouveau_device *dev, void *ptr, int size,
+ struct nouveau_bo **bo)
+{
+ struct nouveau_bo_priv *nvbo;
+ int ret;
+
+ ret = nouveau_bo_new(dev, NOUVEAU_BO_MAP, 0, size, bo);
+ if (ret)
+ return ret;
+ nvbo = nouveau_bo(*bo);
+
+ nvbo->systemem = ptr;
+ nvbo->user = 1;
+ return 0;
+}

```

```

+
+int
+nouveau_bo_wrap(struct nouveau_device *dev, uint32_t handle,
+ struct nouveau_bo **bo)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(dev);
+ struct drm_nouveau_gem_info req;
+ struct nouveau_bo_priv *nvbo;
+ int ret;
+
+ ret = nouveau_bo_new(dev, 0, 0, 0, bo);
+ if (ret)
+ return ret;
+ nvbo = nouveau_bo(*bo);
+
+ req.handle = handle;
+ ret = drmCommandWriteRead(nvdev->fd, DRM_NOUVEAU_GEM_INFO,
+ &req, sizeof(req));
+ if (ret) {
+ nouveau_bo_ref(NULL, bo);
+ return ret;
+ }
+
+ nouveau_bo_info(nvbo, &req);
+ nvbo->base.size
+ = nvbo->size;
+ return 0;
+}
+
+int
+nouveau_bo_handle_get(struct nouveau_bo *bo, uint32_t *handle)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(bo->device);
+ struct nouveau_bo_priv *nvbo = nouveau_bo(bo);
+ int ret;
+
+ if (!bo || !handle)
+ return -EINVAL;
+
+ if (!nvbo->global_handle) {
+ struct drm_gem_flink req;
+
+ ret = nouveau_bo_kalloc(nvbo, NULL);
+ if (ret)
+ return ret;
+
+ req.handle = nvbo->handle;
+ ret = drmIoctl(nvdev->fd, DRM_IOCTL_GEM_FLINK, &req);

```

```

+ if (ret) {
+   nouveau_bo_kfree(nvbo);
+   return ret;
+ }
+
+ nvbo->global_handle = req.name;
+ }
+
+ *handle = nvbo->global_handle;
+ return 0;
+}
+
+int
+nouveau_bo_handle_ref(struct nouveau_device *dev, uint32_t handle,
+   struct nouveau_bo **bo)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(dev);
+ struct nouveau_bo_priv *nvbo;
+ struct drm_gem_open req;
+ int ret;
+
+ req.name = handle;
+ ret = drmIoctl(nvdev->fd, DRM_IOCTL_GEM_OPEN, &req);
+ if (ret) {
+   nouveau_bo_ref(NULL,
+   bo);
+   return ret;
+ }
+
+ ret = nouveau_bo_wrap(dev, req.handle, bo);
+ if (ret) {
+   nouveau_bo_ref(NULL, bo);
+   return ret;
+ }
+
+ nvbo = nouveau_bo(*bo);
+ nvbo->base.handle = nvbo->handle;
+ return 0;
+}
+
+static void
+nouveau_bo_del(struct nouveau_bo **bo)
+{
+ struct nouveau_bo_priv *nvbo;
+
+ if (!bo || !*bo)
+   return;
+ nvbo = nouveau_bo(*bo);

```



```

+ *bo = NULL;
+
+ if (--nvbo->refcount)
+ return;
+
+ if (nvbo->pending) {
+ nvbo->pending = NULL;
+ nouveau_pushbuf_flush(nvbo->pending_channel, 0);
+ }
+
+ nouveau_bo_ufree(nvbo);
+ nouveau_bo_kfree(nvbo);
+ free(nvbo);
+}
+
+int
+nouveau_bo_ref(struct nouveau_bo *ref, struct nouveau_bo **pbo)
+{
+ if (!pbo)
+ return -EINVAL;
+
+ if (ref)
+ nouveau_bo(ref)->refcount++;
+
+ if (*pbo)
+ nouveau_bo_del(pbo);
+
+ *pbo = ref;
+ return 0;
+}
+
+static int
+nouveau_bo_wait(struct nouveau_bo *bo, int cpu_write, int no_wait, int no_block)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(bo->device);
+ struct
+ nouveau_bo_priv *nvbo = nouveau_bo(bo);
+ struct drm_nouveau_gem_cpu_prep req;
+ int ret;
+
+ if (!nvbo->global_handle && !nvbo->write_marker && !cpu_write)
+ return 0;
+
+ if (nvbo->pending &&
+ (nvbo->pending->write_domains || cpu_write)) {
+ nvbo->pending = NULL;
+ nouveau_pushbuf_flush(nvbo->pending_channel, 0);
+ }

```

```

+
+ req.handle = nvbo->handle;
+ req.flags = 0;
+ if (cpu_write)
+ req.flags |= NOUVEAU_GEM_CPU_PREP_WRITE;
+ if (no_wait)
+ req.flags |= NOUVEAU_GEM_CPU_PREP_NOWAIT;
+ if (no_block)
+ req.flags |= NOUVEAU_GEM_CPU_PREP_NOBLOCK;
+
+ do {
+ ret = drmCommandWrite(nvdev->fd, DRM_NOUVEAU_GEM_CPU_PREP,
+     &req, sizeof(req));
+ } while (ret == -EAGAIN);
+ if (ret)
+ return ret;
+
+ if (ret == 0)
+ nvbo->write_marker = 0;
+ return 0;
+}
+
+int
+nouveau_bo_map_range(struct nouveau_bo *bo, uint32_t delta, uint32_t size,
+    uint32_t flags)
+{
+ struct nouveau_bo_priv *nvbo = nouveau_bo(bo);
+ int ret;
+
+ if (!nvbo || bo->map)
+ return -EINVAL;
+
+ if (!nouveau_bo_allocated(nvbo))
+ {
+ if (nvbo->flags & (NOUVEAU_BO_VRAM | NOUVEAU_BO_GART)) {
+ ret = nouveau_bo_kalloc(nvbo, NULL);
+ if (ret)
+ return ret;
+ }
+
+ if (!nouveau_bo_allocated(nvbo)) {
+ ret = nouveau_bo_ualloc(nvbo);
+ if (ret)
+ return ret;
+ }
+ }
+
+ if (nvbo->systemem) {

```

```

+ bo->map = (char *)nvbo->sysmem + delta;
+ } else {
+ ret = nouveau_bo_kmap(nvbo);
+ if (ret)
+ return ret;
+
+ if (!(flags & NOUVEAU_BO_NOSYNC)) {
+ ret = nouveau_bo_wait(bo, (flags & NOUVEAU_BO_WR),
+ (flags & NOUVEAU_BO_NOWAIT), 0);
+ if (ret)
+ return ret;
+
+ nvbo->map_refcnt++;
+ }
+
+ bo->map = (char *)nvbo->map + delta;
+ }
+
+ return 0;
+}
+
+void
+nouveau_bo_map_flush(struct nouveau_bo *bo, uint32_t delta, uint32_t size)
+{
+}
+
+int
+nouveau_bo_map(struct nouveau_bo *bo, uint32_t flags)
+{
+ return nouveau_bo_map_range(bo, 0, bo->size, flags);
+}
+
+void
+nouveau_bo_unmap(struct nouveau_bo *bo)
+{
+ struct nouveau_bo_priv *nvbo = nouveau_bo(bo);
+
+ if
+ (bo->map && !nvbo->sysmem && nvbo->map_refcnt) {
+ struct nouveau_device_priv *nvdev = nouveau_device(bo->device);
+ struct drm_nouveau_gem_cpu_fini req;
+
+ req.handle = nvbo->handle;
+ drmCommandWrite(nvdev->fd, DRM_NOUVEAU_GEM_CPU_FINI,
+ &req, sizeof(req));
+ nvbo->map_refcnt--;
+ }
+}
+

```

```

+ bo->map = NULL;
+}
+
+int
+nouveau_bo_busy(struct nouveau_bo *bo, uint32_t access)
+{
+ return nouveau_bo_wait(bo, (access & NOUVEAU_BO_WR), 1, 1);
+}
+
+uint32_t
+nouveau_bo_pending(struct nouveau_bo *bo)
+{
+ struct nouveau_bo_priv *nvbo = nouveau_bo(bo);
+ uint32_t flags;
+
+ if (!nvbo->pending)
+ return 0;
+
+ flags = 0;
+ if (nvbo->pending->read_domains)
+ flags |= NOUVEAU_BO_RD;
+ if (nvbo->pending->write_domains)
+ flags |= NOUVEAU_BO_WR;
+
+ return flags;
+}
+
+struct drm_nouveau_gem_pushbuf_bo *
+nouveau_bo_emit_buffer(struct nouveau_channel *chan, struct nouveau_bo *bo)
+{
+ struct nouveau_pushbuf_priv *nvpb = &nouveau_channel(chan)->pb;
+ struct nouveau_bo_priv *nvbo = nouveau_bo(bo);
+ struct
+   drm_nouveau_gem_pushbuf_bo *pbbo;
+ struct nouveau_bo *ref = NULL;
+ int ret;
+
+ if (nvbo->pending)
+ return nvbo->pending;
+
+ if (!nvbo->handle) {
+ ret = nouveau_bo_kalloc(nvbo, chan);
+ if (ret)
+ return NULL;
+
+ if (nvbo->systemem) {
+ void *systemem_tmp = nvbo->systemem;
+

```

```

+ nvbo->sysmem = NULL;
+ ret = nouveau_bo_map(bo, NOUVEAU_BO_WR);
+ if (ret)
+ return NULL;
+ nvbo->sysmem = sysmem_tmp;
+
+ memcpy(bo->map, nvbo->sysmem, nvbo->base.size);
+ nouveau_bo_ufree(nvbo);
+ nouveau_bo_unmap(bo);
+ }
+ }
+
+ if (nvpb->nr_buffers >= NOUVEAU_GEM_MAX_BUFFERS)
+ return NULL;
+ pbbo = nvpb->buffers + nvpb->nr_buffers++;
+ nvbo->pending = pbbo;
+ nvbo->pending_channel = chan;
+ nvbo->pending_refcnt = 0;
+
+ nouveau_bo_ref(bo, &ref);
+ pbbo->user_priv = (uint64_t)(unsigned long)ref;
+ pbbo->handle = nvbo->handle;
+ pbbo->valid_domains = NOUVEAU_GEM_DOMAIN_VRAM | NOUVEAU_GEM_DOMAIN_GART;
+ pbbo->read_domains = 0;
+ pbbo->write_domains = 0;
+ pbbo->presumed.domain
= nvbo->domain;
+ pbbo->presumed.offset = nvbo->offset;
+ pbbo->presumed.valid = 1;
+ return pbbo;
+ }

```

```
diff --git a/nouveau-1/nouveau_bo.h b/nouveau-1/nouveau_bo.h
```

```
new file mode 100644
```

```
index 0000000..3a1f2d4
```

```
--- /dev/null
```

```
+++ b/nouveau-1/nouveau_bo.h
```

```
@@ -0,0 +1,104 @@
```

```
+/*
```

```
+ * Copyright 2007 Nouveau Project
```

```
+ *
```

```
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
```

```
+ *
```

```
+ * The above copyright notice and this permission notice shall be included in
```

```

+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#ifndef __NOUVEAU_BO_H__
+#define __NOUVEAU_BO_H__
+
+/* Relocation/Buffer type flags */
+#define NOUVEAU_BO_VRAM (1 << 0)
+#define NOUVEAU_BO_GART (1 << 1)
+#define NOUVEAU_BO_RD (1 << 2)
+#define NOUVEAU_BO_WR (1 << 3)
+#define NOUVEAU_BO_RDWR (NOUVEAU_BO_RD | NOUVEAU_BO_WR)
+#define NOUVEAU_BO_MAP (1 << 4)
+#define NOUVEAU_BO_LOW (1 << 6)
+#define NOUVEAU_BO_HIGH (1 << 7)
+#define NOUVEAU_BO_OR (1 << 8)
+#define NOUVEAU_BO_INVALID (1 << 12)
+#define NOUVEAU_BO_NOSYNC (1 << 13)
+#define NOUVEAU_BO_NOWAIT (1 << 14)
+#define NOUVEAU_BO_IFLUSH (1 << 15)
+#define NOUVEAU_BO_DUMMY
(1 << 31)
+
+#define NOUVEAU_BO_TILE_LAYOUT_MASK 0x0000ff00
+#define NOUVEAU_BO_TILE_16BPP 0x00000001
+#define NOUVEAU_BO_TILE_32BPP 0x00000002
+#define NOUVEAU_BO_TILE_ZETA 0x00000004
+#define NOUVEAU_BO_TILE_SCANOUT 0x00000008
+
+struct nouveau_bo {
+ struct nouveau_device *device;
+ uint32_t handle;
+
+ uint64_t size;
+ void *map;
+
+ uint32_t tile_mode;
+ uint32_t tile_flags;
+};

```

```

+
+int
+nouveau_bo_new(struct nouveau_device *, uint32_t flags, int align, int size,
+   struct nouveau_bo **);
+
+int
+nouveau_bo_new_tile(struct nouveau_device *, uint32_t flags, int align,
+   int size, uint32_t tile_mode, uint32_t tile_flags,
+   struct nouveau_bo **);
+
+int
+nouveau_bo_user(struct nouveau_device *, void *ptr, int size,
+   struct nouveau_bo **);
+
+int
+nouveau_bo_wrap(struct nouveau_device *, uint32_t handle, struct nouveau_bo **);
+
+int
+nouveau_bo_handle_get(struct nouveau_bo *, uint32_t *);
+
+int
+nouveau_bo_handle_ref(struct nouveau_device
+   *, uint32_t handle,
+   struct nouveau_bo **);
+
+int
+nouveau_bo_ref(struct nouveau_bo *, struct nouveau_bo **);
+
+int
+nouveau_bo_map_range(struct nouveau_bo *, uint32_t delta, uint32_t size,
+   uint32_t flags);
+
+void
+nouveau_bo_map_flush(struct nouveau_bo *, uint32_t delta, uint32_t size);
+
+int
+nouveau_bo_map(struct nouveau_bo *, uint32_t flags);
+
+void
+nouveau_bo_unmap(struct nouveau_bo *);
+
+int
+nouveau_bo_busy(struct nouveau_bo *, uint32_t access);
+
+uint32_t
+nouveau_bo_pending(struct nouveau_bo *);
+
+#endif

```

```

diff --git a/nouveau-1/nouveau_channel.c b/nouveau-1/nouveau_channel.c
new file mode 100644
index 0000000..96fa03b
--- /dev/null
+++ b/nouveau-1/nouveau_channel.c
@@ -0,0 +1,142 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without
+ * limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#include <stdlib.h>
+#include <string.h>
+#include <errno.h>
+
+#include "nouveau_private.h"
+
+int
+nouveau_channel_alloc(struct nouveau_device
+ *dev, uint32_t fb_ctxdma,
+ uint32_t tt_ctxdma, int pushbuf_size,
+ struct nouveau_channel **chan)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(dev);
+ struct nouveau_channel_priv *nvchan;
+ unsigned i;
+ int ret;
+
+ if (!nvdev || !chan || *chan)
+ return -EINVAL;

```



```

+
+ nvchan = calloc(1, sizeof(struct nouveau_channel_priv));
+ if (!nvchan)
+ return -ENOMEM;
+ nvchan->base.device = dev;
+
+ nvchan->drm.fb_ctxdma_handle = fb_ctxdma;
+ nvchan->drm.tt_ctxdma_handle = tt_ctxdma;
+ ret = drmCommandWriteRead(nvdev->fd, DRM_NOUVEAU_CHANNEL_ALLOC,
+ &nvchan->drm, sizeof(nvchan->drm));
+ if (ret) {
+ free(nvchan);
+ return ret;
+ }
+
+ nvchan->base.id = nvchan->drm.channel;
+ if (nouveau_grobj_ref(&nvchan->base, nvchan->drm.fb_ctxdma_handle,
+ &nvchan->base.vram) ||
+ nouveau_grobj_ref(&nvchan->base, nvchan->drm.tt_ctxdma_handle,
+ &nvchan->base.gart)) {
+ nouveau_channel_free((void *)&nvchan);
+ return -EINVAL;
+ }
+
+ /* Mark all
+ DRM-assigned subchannels as in-use */
+ for (i = 0; i < nvchan->drm.nr_subchan; i++) {
+ struct nouveau_grobj_priv *gr = calloc(1, sizeof(*gr));
+
+ gr->base.bound = NOUVEAU_GROBJ_BOUND_EXPLICIT;
+ gr->base.subc = i;
+ gr->base.handle = nvchan->drm.subchan[i].handle;
+ gr->base.grclass = nvchan->drm.subchan[i].grclass;
+ gr->base.channel = &nvchan->base;
+
+ nvchan->base.subc[i].gr = &gr->base;
+ }
+
+ if (dev->chipset < 0xc0) {
+ ret = nouveau_bo_wrap(dev, nvchan->drm.notifier_handle,
+ &nvchan->notifier_bo);
+ if (!ret)
+ ret = nouveau_bo_map(nvchan->notifier_bo,
+ NOUVEAU_BO_RDWR);
+ if (ret) {
+ nouveau_channel_free((void *)&nvchan);
+ return ret;
+ }

```

```

+
+ ret = nouveau_grobj_alloc(&nvchan->base, 0x00000000, 0x0030,
+   &nvchan->base.nullobj);
+ if (ret) {
+   nouveau_channel_free((void *)&nvchan);
+   return ret;
+ }
+ }
+
+ ret = nouveau_pushbuf_init(&nvchan->base, pushbuf_size);
+ if (ret) {
+   nouveau_channel_free((void *)&nvchan);
+   return
+   ret;
+ }
+
+ *chan = &nvchan->base;
+ return 0;
+}
+
+void
+nouveau_channel_free(struct nouveau_channel **chan)
+{
+ struct nouveau_channel_priv *nvchan;
+ struct nouveau_device_priv *nvdev;
+ struct drm_nouveau_channel_free cf;
+ unsigned i;
+
+ if (!chan || !**chan)
+   return;
+ nvchan = nouveau_channel(*chan);
+ (*chan)->flush_notify = NULL;
+ *chan = NULL;
+ nvdev = nouveau_device(nvchan->base.device);
+
+ FIRE_RING(&nvchan->base);
+
+ nouveau_pushbuf_fini(&nvchan->base);
+ if (nvchan->notifier_bo) {
+   nouveau_bo_unmap(nvchan->notifier_bo);
+   nouveau_bo_ref(NULL, &nvchan->notifier_bo);
+ }
+
+ for (i = 0; i < nvchan->drm.nr_subchan; i++)
+   free(nvchan->base.subc[i].gr);
+
+ nouveau_grobj_free(&nvchan->base.vram);
+ nouveau_grobj_free(&nvchan->base.gart);

```

```
+ nouveau_grobj_free(&nvchan->base.nullobj);
+
+ cf.channel = nvchan->drm.channel;
+ drmCommandWrite(nvdev->fd, DRM_NOUVEAU_CHANNEL_FREE, &cf, sizeof(cf));
+ free(nvchan);
+}
+
+
diff --git a/nouveau-1/nouveau_channel.h b/nouveau-1/nouveau_channel.h
new
file mode 100644
index 0000000..d61a4c0
--- /dev/null
+++ b/nouveau-1/nouveau_channel.h
@@ -0,0 +1,57 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT
+ * SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#ifndef __NOUVEAU_CHANNEL_H__
+#define __NOUVEAU_CHANNEL_H__
+
+struct nouveau_subchannel {
+ struct nouveau_grobj *gr;
+ unsigned sequence;
+};
+
+struct nouveau_channel {
+ uint32_t *cur;
```

```

+ uint32_t *end;
+
+ struct nouveau_device *device;
+ int id;
+
+ struct nouveau_grobj *nullobj;
+ struct nouveau_grobj *vram;
+ struct nouveau_grobj *gart;
+
+ void *user_private;
+ void (*hang_notify)(struct nouveau_channel *);
+ void (*flush_notify)(struct nouveau_channel *);
+
+ struct nouveau_subchannel subc[8];
+ unsigned subc_sequence;
+};
+
+int
+nouveau_channel_alloc(struct nouveau_device *, uint32_t fb, uint32_t tt,
+ int pushbuf_size, struct nouveau_channel **);
+
+void
+nouveau_channel_free(struct nouveau_channel **);
+
+#endif

```

diff

```
--git a/nouveau-1/nouveau_device.c b/nouveau-1/nouveau_device.c
```

```
new file mode 100644
```

```
index 0000000..425c5d2
```

```
--- /dev/null
```

```
+++ b/nouveau-1/nouveau_device.c
```

```
@@ -0,0 +1,198 @@
```

```
+/*
```

```
+ * Copyright 2007 Nouveau Project
```

```
+ *
```

```
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
```

```
+ *
```

```
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
```

```
+ *
```

```
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR
```

```

PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#include <stdio.h>
+#include <stdlib.h>
+#include <errno.h>
+
+#include "nouveau_private.h"
+
+int
+nouveau_device_open_existing(struct nouveau_device **dev, int close,
+    int fd, drm_context_t ctx)
+{
+    struct nouveau_device_priv *nvdev;
+    drmVersionPtr ver;
+    uint64_t value;
+    int ret;
+
+    if (!dev || *dev)
+        return -EINVAL;
+
+    nvdev = calloc(1, sizeof(*nvdev));
+    if (!nvdev)
+        return -ENOMEM;
+    nvdev->fd = fd;
+    nvdev->ctx = ctx;
+    nvdev->needs_close = close;
+
+    ver = drmGetVersion(fd);
+    if (!ver) {
+        nouveau_device_close((void *)&nvdev);
+        return -EINVAL;
+    }
+
+    if ((ver->version_major == 0 && ver->version_patchlevel != 16) ||
+        ver->version_major > 1) {
+        nouveau_device_close((void
+            *)&nvdev);
+        return -EINVAL;
+    }
+
+    drmFreeVersion(ver);
+
+    ret = nouveau_device_get_param(&nvdev->base,

```

```

+     NOUVEAU_GETPARAM_VM_VRAM_BASE, &value);
+ if (ret) {
+     nouveau_device_close((void *)&nvdev);
+     return ret;
+ }
+ nvdev->base.vm_vram_base = value;
+
+ ret = nouveau_device_get_param(&nvdev->base,
+     NOUVEAU_GETPARAM_FB_SIZE, &value);
+ if (ret) {
+     nouveau_device_close((void *)&nvdev);
+     return ret;
+ }
+ nvdev->base.vm_vram_size = value;
+
+ ret = nouveau_device_get_param(&nvdev->base,
+     NOUVEAU_GETPARAM_AGP_SIZE, &value);
+ if (ret) {
+     nouveau_device_close((void *)&nvdev);
+     return ret;
+ }
+ nvdev->base.vm_gart_size = value;
+
+ ret = nouveau_bo_init(&nvdev->base);
+ if (ret) {
+     nouveau_device_close((void *)&nvdev);
+     return ret;
+ }
+
+ ret = nouveau_device_get_param(&nvdev->base,
+     NOUVEAU_GETPARAM_CHIPSET_ID, &value);
+ if (ret) {
+     nouveau_device_close((void *)&nvdev);
+     return ret;
+ }
+ nvdev->base.chipset
+     = value;
+
+ ret = nouveau_device_get_param(&nvdev->base,
+     NOUVEAU_GETPARAM_HAS_BO_USAGE, &value);
+ if (!ret)
+     nvdev->has_bo_usage = value;
+
+ *dev = &nvdev->base;
+ return 0;
+ }
+
+int

```

```

+nouveau_device_open(struct nouveau_device **dev, const char *busid)
+{
+ drm_context_t ctx;
+ int fd, ret;
+
+ if (!dev || *dev)
+ return -EINVAL;
+
+ fd = drmOpen("nouveau", busid);
+ if (fd < 0)
+ return -EINVAL;
+
+ ret = drmCreateContext(fd, &ctx);
+ if (ret) {
+ drmClose(fd);
+ return ret;
+ }
+
+ ret = nouveau_device_open_existing(dev, 1, fd, ctx);
+ if (ret) {
+ drmDestroyContext(fd, ctx);
+ drmClose(fd);
+ return ret;
+ }
+
+ return 0;
+}
+
+void
+nouveau_device_close(struct nouveau_device **dev)
+{
+ struct nouveau_device_priv *nvdev;
+
+ if (!dev || !*dev)
+ return;
+ nvdev = nouveau_device(*dev);
+ *dev = NULL;
+
+ nouveau_bo_takedown(&nvdev->base);
+
+ if (nvdev->needs_close) {
+ drmDestroyContext(nvdev->fd, nvdev->ctx);
+ drmClose(nvdev->fd);
+ }
+ free(nvdev);
+}
+
+int

```

```

+nouveau_device_get_param(struct
nouveau_device *dev,
+ uint64_t param, uint64_t *value)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(dev);
+ struct drm_nouveau_getparam g;
+ int ret;
+
+
+ if (!nvdev || !value)
+ return -EINVAL;
+
+
+ g.param = param;
+ ret = drmCommandWriteRead(nvdev->fd, DRM_NOUVEAU_GETPARAM,
+ &g, sizeof(g));
+ if (ret)
+ return ret;
+
+
+ *value = g.value;
+ return 0;
+}
+
+int
+nouveau_device_set_param(struct nouveau_device *dev,
+ uint64_t param, uint64_t value)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(dev);
+ struct drm_nouveau_setparam s;
+ int ret;
+
+
+ if (!nvdev)
+ return -EINVAL;
+
+
+ s.param = param;
+ s.value = value;
+ ret = drmCommandWriteRead(nvdev->fd, DRM_NOUVEAU_SETPARAM,
+ &s, sizeof(s));
+ if (ret)
+ return ret;
+
+
+ return 0;
+}
+
diff --git a/nouveau-1/nouveau_device.h b/nouveau-1/nouveau_device.h
new file mode 100644
index 0000000..c0d9333
--- /dev/null
+++ b/nouveau-1/nouveau_device.h
@@

```



```

-0,0 +1,33 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT,
+ * TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+
+#ifndef __NOUVEAU_DEVICE_H__
+#define __NOUVEAU_DEVICE_H__
+
+struct nouveau_device {
+ unsigned chipset;
+ uint64_t vm_vram_base;
+ uint64_t vm_vram_size;
+ uint64_t vm_gart_size;
+ };
+
+#endif
diff --git a/nouveau-1/nouveau_drmif.h b/nouveau-1/nouveau_drmif.h
new file mode 100644
index 0000000..ec226a2
--- /dev/null
+++ b/nouveau-1/nouveau_drmif.h
@@ -0,0 +1,58 @@
+/*
+ * Copyright 2008 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,

```

```

+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#ifndef __NOUVEAU_DRMIF_H__
+#define __NOUVEAU_DRMIF_H__
+
+#include <stdint.h>
+#include <xf86drm.h>
+
+#include "nouveau_device.h"
+
+struct nouveau_device_priv {
+ struct nouveau_device base;
+
+ int fd;
+ drm_context_t ctx;
+ drmLock *lock;
+ int needs_close;
+ int has_bo_usage;
+ };
+#define nouveau_device(n) ((struct nouveau_device_priv *) (n))
+
+int
+nouveau_device_open_existing(struct
+nouveau_device **, int close,
+ int fd, drm_context_t ctx);
+
+int
+nouveau_device_open(struct nouveau_device **, const char *busid);
+
+void
+nouveau_device_close(struct nouveau_device **);
+
+int
+nouveau_device_get_param(struct nouveau_device *, uint64_t param, uint64_t *v);

```

```

+
+int
+nouveau_device_set_param(struct nouveau_device *, uint64_t param, uint64_t val);
+
+#endif
diff --git a/nouveau-1/nouveau_grobject b/nouveau-1/nouveau_grobject
new file mode 100644
index 0000000..36344b9
--- /dev/null
+++ b/nouveau-1/nouveau_grobject
@@ -0,0 +1,148 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to
+ * whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#include <stdlib.h>
+#include <errno.h>
+
+#include "nouveau_private.h"
+
+int
+nouveau_grobject_alloc(struct nouveau_channel *chan, uint32_t handle,
+ int class, struct nouveau_grobject **grobject)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(chan->device);
+ struct nouveau_grobject_priv *nvgrobject;
+ struct
+ drm_nouveau_grobject_alloc g;
+ int ret;

```

```

+
+ if (!nvdev || !grobj || *grobj)
+ return -EINVAL;
+
+ nvgrobj = calloc(1, sizeof(*nvgrobj));
+ if (!nvgrobj)
+ return -ENOMEM;
+ nvgrobj->base.channel = chan;
+ nvgrobj->base.handle = handle;
+ nvgrobj->base.grclass = class;
+ nvgrobj->base.bound = NOUVEAU_GROBJ_UNBOUND;
+ nvgrobj->base.subc = -1;
+
+ g.channel = chan->id;
+ g.handle = handle;
+ g.class = class;
+ ret = drmCommandWrite(nvdev->fd, DRM_NOUVEAU_GROBJ_ALLOC,
+ &g, sizeof(g));
+ if (ret) {
+ nouveau_grobj_free((void *)&nvgrobj);
+ return ret;
+ }
+
+ *grobj = &nvgrobj->base;
+ return 0;
+}
+
+int
+nouveau_grobj_ref(struct nouveau_channel *chan, uint32_t handle,
+ struct nouveau_grobj **grobj)
+{
+ struct nouveau_grobj_priv *nvgrobj;
+
+ if (!chan || !grobj || *grobj)
+ return -EINVAL;
+
+ nvgrobj = calloc(1, sizeof(struct nouveau_grobj_priv));
+ if (!nvgrobj)
+ return -ENOMEM;
+ nvgrobj->base.channel = chan;
+ nvgrobj->base.handle = handle;
+ nvgrobj->base.grclass
+ = 0;
+
+ *grobj = &nvgrobj->base;
+ return 0;
+}
+

```

```

+void
+nouveau_grobj_free(struct nouveau_grobj **grobj)
+{
+ struct nouveau_device_priv *nvdev;
+ struct nouveau_channel_priv *chan;
+ struct nouveau_grobj_priv *nvgrobj;
+
+ if (!grobj || !*grobj)
+ return;
+ nvgrobj = nouveau_grobj(*grobj);
+ *grobj = NULL;
+
+
+ chan = nouveau_channel(nvgrobj->base.channel);
+ nvdev = nouveau_device(chan->base.device);
+
+ if (nvgrobj->base.grclass) {
+ struct drm_nouveau_gpuobj_free f;
+
+ FIRE_RING(&chan->base);
+ f.channel = chan->drm.channel;
+ f.handle = nvgrobj->base.handle;
+ drmCommandWrite(nvdev->fd, DRM_NOUVEAU_GPUOBJ_FREE,
+ &f, sizeof(f));
+ }
+ if (nvgrobj->base.bound != NOUVEAU_GROBJ_UNBOUND)
+ chan->base.subc[nvgrobj->base.subc].gr = NULL;
+ free(nvgrobj);
+}
+
+void
+nouveau_grobj_autobind(struct nouveau_grobj *grobj)
+{
+ struct nouveau_channel *chan = grobj->channel;
+ struct nouveau_subchannel *subc = NULL;
+ int i;
+
+ for (i = 0; i < 8; i++) {
+ struct
+ nouveau_subchannel *scc = &grobj->channel->subc[i];
+
+ if (scc->gr && scc->gr->bound == NOUVEAU_GROBJ_BOUND_EXPLICIT)
+ continue;
+
+ if (!subc || scc->sequence < subc->sequence)
+ subc = scc;
+ }
+}

```

```

+ if (subc->gr) {
+ subc->gr->bound = NOUVEAU_GROBJ_UNBOUND;
+ subc->gr->subc = -1;
+ }
+
+ subc->gr = grobj;
+ subc->gr->bound = NOUVEAU_GROBJ_BOUND;
+ subc->gr->subc = subc - &grobj->channel->subc[0];
+
+ WAIT_RING(chan, 2);
+ if (chan->device->chipset < 0xc0) {
+ OUT_RING (chan, (1 << 18) | (grobj->subc << 13));
+ OUT_RING (chan, grobj->handle);
+ } else {
+ OUT_RING (chan, (2 << 28) | (1 << 16) | (grobj->subc << 13));
+ OUT_RING (chan, grobj->grclass);
+ }
+}
+
diff --git a/nouveau-1/nouveau_grobj.h b/nouveau-1/nouveau_grobj.h
new file mode 100644
index 0000000..51ac7d9
--- /dev/null
+++ b/nouveau-1/nouveau_grobj.h
@@ -0,0 +1,48 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this
+ * software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+

```

```

+ifndef __NOUVEAU_GROBJ_H__
+#define
+__NOUVEAU_GROBJ_H__
+
+#include "nouveau_channel.h"
+
+struct nouveau_grobj {
+ struct nouveau_channel *channel;
+ int grclass;
+ uint32_t handle;
+
+ enum {
+ NOUVEAU_GROBJ_UNBOUND = 0,
+ NOUVEAU_GROBJ_BOUND = 1,
+ NOUVEAU_GROBJ_BOUND_EXPLICIT = 2
+ } bound;
+ int subc;
+};
+
+int nouveau_grobj_alloc(struct nouveau_channel *, uint32_t handle,
+ int class, struct nouveau_grobj **);
+int nouveau_grobj_ref(struct nouveau_channel *, uint32_t handle,
+ struct nouveau_grobj **);
+void nouveau_grobj_free(struct nouveau_grobj **);
+void nouveau_grobj_autobind(struct nouveau_grobj *);
+
+#endif
diff --git a/nouveau-1/nouveau_notififier.c b/nouveau-1/nouveau_notififier.c
new file mode 100644
index 0000000..513fa63
--- /dev/null
+++ b/nouveau-1/nouveau_notififier.c
@@ -0,0 +1,148 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files
+ * (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

```

```

+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.

```

```
+ */
```

```
+
```

```
+#include <stdlib.h>
```

```
+#include <errno.h>
```

```
+#include <sys/time.h>
```

```
+
```

```
+#include
```

```
"nouveau_private.h"
```

```
+
```

```
+#define NOTIFIER(__v) \
```

```
+ struct nouveau_notifier_priv *nvnotify = nouveau_notifier(notifier); \
```

```
+ volatile uint32_t *__v = (uint32_t *)((char *)nvnotify->map + (id * 32))
```

```
+
```

```
+int
```

```
+nouveau_notifier_alloc(struct nouveau_channel *chan, uint32_t handle,
```

```
+ int count, struct nouveau_notifier **notifier)
```

```
+{
```

```
+ struct nouveau_notifier_priv *nvnotify;
```

```
+ int ret;
```

```
+
```

```
+ if (!chan || !notifier || *notifier)
```

```
+ return -EINVAL;
```

```
+
```

```
+ nvnotify = calloc(1, sizeof(struct nouveau_notifier_priv));
```

```
+ if (!nvnotify)
```

```
+ return -ENOMEM;
```

```
+ nvnotify->base.channel = chan;
```

```
+ nvnotify->base.handle = handle;
```

```
+
```

```
+ nvnotify->drm.channel = chan->id;
```

```
+ nvnotify->drm.handle = handle;
```

```
+ nvnotify->drm.size = (count * 32);
```

```
+ if ((ret = drmCommandWriteRead(nouveau_device(chan->device)->fd,
```

```
+ DRM_NOUVEAU_NOTIFIEROBJ_ALLOC,
```

```
+ &nvnotify->drm,
```

```
+ sizeof(nvnotify->drm))) {
```

```
+ nouveau_notifier_free((void
```

```
*)&nvnotify);
```

```
+ return ret;
```

```
+ }
```

```
+
```

```
+ nvnotify->map = (char *)nouveau_channel(chan)->notifier_bo->map +
```



```

+ nvnotify->drm.offset;
+ *notifier = &nvnotify->base;
+ return 0;
+}
+
+void
+nouveau_notifier_free(struct nouveau_notifier **notifier)
+{
+
+ struct nouveau_notifier_priv *nvnotify;
+ struct nouveau_channel_priv *nvchan;
+ struct nouveau_device_priv *nvdev;
+ struct drm_nouveau_gpuobj_free f;
+
+ if (!notifier || !*notifier)
+ return;
+ nvnotify = nouveau_notifier(*notifier);
+ *notifier = NULL;
+
+ nvchan = nouveau_channel(nvnotify->base.channel);
+ nvdev = nouveau_device(nvchan->base.device);
+
+ FIRE_RING(&nvchan->base);
+
+ f.channel = nvchan->drm.channel;
+ f.handle = nvnotify->base.handle;
+ drmCommandWrite(nvdev->fd, DRM_NOUVEAU_GPUOBJ_FREE, &f, sizeof(f));
+ free(nvnotify);
+}
+
+void
+nouveau_notifier_reset(struct nouveau_notifier *notifier, int id)
+{
+ NOTIFIER(n);
+
+ n[NV_NOTIFY_TIME_0 /4] = 0x00000000;
+ n[NV_NOTIFY_TIME_1 /4] = 0x00000000;
+ n[NV_NOTIFY_RETURN_VALUE/4]
+ = 0x00000000;
+ n[NV_NOTIFY_STATE /4] = (NV_NOTIFY_STATE_STATUS_IN_PROCESS <<
+ NV_NOTIFY_STATE_STATUS_SHIFT);
+}
+
+uint32_t
+nouveau_notifier_status(struct nouveau_notifier *notifier, int id)
+{
+ NOTIFIER(n);
+

```

```

+ return n[NV_NOTIFY_STATE/4] >> NV_NOTIFY_STATE_STATUS_SHIFT;
+}
+
+uint32_t
+nouveau_notifier_return_val(struct nouveau_notifier *notifier, int id)
+{
+ NOTIFIER(n);
+
+ return n[NV_NOTIFY_RETURN_VALUE/4];
+}
+
+static inline double
+gettime(void)
+{
+ struct timeval tv;
+
+ gettimeofday(&tv, NULL);
+ return (double)tv.tv_sec + tv.tv_usec / 1000000.0;
+}
+
+int
+nouveau_notifier_wait_status(struct nouveau_notifier *notifier, int id,
+ uint32_t status, double timeout)
+{
+ NOTIFIER(n);
+ double time = 0, t_start = gettime();
+
+ while (time <= timeout) {
+ uint32_t v;
+
+ v = n[NV_NOTIFY_STATE/4] >> NV_NOTIFY_STATE_STATUS_SHIFT;
+ if (v == status)
+ return 0;
+
+ if (timeout)
+ time = gettime() - t_start;
+ }
+
+ return
+ -EBUSY;
+}
+
diff --git a/nouveau-1/nouveau_notifier.h b/nouveau-1/nouveau_notifier.h
new file mode 100644
index 0000000..dbc6a3b
--- /dev/null
+++ b/nouveau-1/nouveau_notifier.h
@@ -0,0 +1,63 @@

```

```

+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#ifndef __NOUVEAU_NOTIFIER_H__
+#define __NOUVEAU_NOTIFIER_H__
+
+#define NV_NOTIFIER_SIZE                32
+#define NV_NOTIFY_TIME_0                0x00000000
+#define NV_NOTIFY_TIME_1                0x00000004
+#define NV_NOTIFY_RETURN_VALUE          0x00000008
+#define NV_NOTIFY_STATE                  0x0000000C
+#define NV_NOTIFY_STATE_STATUS_MASK      0xFF000000
+#define NV_NOTIFY_STATE_STATUS_SHIFT     24
+#define NV_NOTIFY_STATE_STATUS_COMPLETED 0x00
+#define NV_NOTIFY_STATE_STATUS_IN_PROCESS 0x01
+#define NV_NOTIFY_STATE_ERROR_CODE_MASK  0x0000FFFF
+#define NV_NOTIFY_STATE_ERROR_CODE_SHIFT 0
+
+struct nouveau_notifier {
+ struct nouveau_channel *channel;
+ uint32_t handle;
+};
+
+int
+nouveau_notifier_alloc(struct nouveau_channel *, uint32_t handle, int count,
+ struct nouveau_notifier **);
+

```

```

+void
+nouveau_notifier_free(struct nouveau_notifier **);
+
+void
+nouveau_notifier_reset(struct nouveau_notifier *, int id);
+
+uint32_t
+nouveau_notifier_status(struct nouveau_notifier *, int id);
+
+uint32_t
+nouveau_notifier_return_val(struct nouveau_notifier *, int id);
+
+int
+nouveau_notifier_wait_status(struct nouveau_notifier *, int id, uint32_t status,
+    double timeout);
+
+#endif
diff --git a/nouveau-1/nouveau_private.h b/nouveau-1/nouveau_private.h
new file mode 100644
index
0000000..124fe87
--- /dev/null
+++ b/nouveau-1/nouveau_private.h
@@ -0,0 +1,136 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM,
+ * DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+#ifndef __NOUVEAU_PRIVATE_H__

```

```

+#define __NOUVEAU_PRIVATE_H__
+
+#include <stdint.h>
+#include <xf86drm.h>
+#include <nouveau_drm.h>
+
+#include "nouveau_drmif.h"
+#include "nouveau_device.h"
+#include "nouveau_channel.h"
+#include "nouveau_grobj.h"
+#include "nouveau_notifier.h"
+#include "nouveau_bo.h"
+#include "nouveau_resource.h"
+#include "nouveau_pushbuf.h"
+#include "nouveau_reloc.h"
+
+#define CALPB_BUFFERS 3
+
+struct nouveau_pushbuf_priv {
+ uint32_t cal_suffix0;
+ uint32_t cal_suffix1;
+ struct nouveau_bo *buffer[CALPB_BUFFERS];
+ int current;
+ int current_offset;
+
+ unsigned *pushbuf;
+ unsigned size;
+
+ uint32_t *marker;
+ unsigned marker_offset;
+ unsigned marker_relocs;
+ unsigned marker_push;
+
+ struct drm_nouveau_gem_pushbuf_bo *buffers;
+ unsigned nr_buffers;
+ struct
+   drm_nouveau_gem_pushbuf_reloc *relocs;
+ unsigned nr_relocs;
+ struct drm_nouveau_gem_pushbuf_push push[NOUVEAU_GEM_MAX_PUSH];
+ unsigned nr_push;
+};
+#define nouveau_pushbuf(n) ((struct nouveau_pushbuf_priv *) (n))
+
+int
+nouveau_pushbuf_init(struct nouveau_channel *, int buf_size);
+void
+nouveau_pushbuf_fini(struct nouveau_channel *);
+

```

```

+struct nouveau_channel_priv {
+ struct nouveau_channel base;
+
+ struct drm_nouveau_channel_alloc drm;
+
+ struct nouveau_bo *notifier_bo;
+
+ struct nouveau_pushbuf_priv pb;
+};
+#define nouveau_channel(n) ((struct nouveau_channel_priv *) (n))
+
+struct nouveau_grobj_priv {
+ struct nouveau_grobj base;
+};
+#define nouveau_grobj(n) ((struct nouveau_grobj_priv *) (n))
+
+struct nouveau_notifier_priv {
+ struct nouveau_notifier base;
+
+ struct drm_nouveau_notifierobj_alloc drm;
+ volatile void *map;
+};
+#define nouveau_notifier(n) ((struct nouveau_notifier_priv *) (n))
+
+struct nouveau_bo_priv {
+ struct nouveau_bo base;
+ int refcount;
+
+ /*
+  * Buffer configuration + usage hints */
+ unsigned flags;
+ unsigned size;
+ unsigned align;
+ int user;
+
+ /* Tracking */
+ struct drm_nouveau_gem_pushbuf_bo *pending;
+ struct nouveau_channel *pending_channel;
+ int pending_refcnt;
+ int write_marker;
+
+ /* Userspace object */
+ void *systemem;
+
+ /* Kernel object */
+ uint32_t global_handle;
+ drm_handle_t handle;
+ uint64_t map_handle;

```

```

+ int map_refcnt;
+ void *map;
+
+ /* Last known information from kernel on buffer status */
+ uint64_t offset;
+ uint32_t domain;
+};
+#define nouveau_bo(n) ((struct nouveau_bo_priv *)(n))
+
+int
+nouveau_bo_init(struct nouveau_device *);
+
+void
+nouveau_bo_takedown(struct nouveau_device *);
+
+struct drm_nouveau_gem_pushbuf_bo *
+nouveau_bo_emit_buffer(struct nouveau_channel *, struct nouveau_bo *);
+
+#endif
diff --git a/nouveau-1/nouveau_pushbuf.c b/nouveau-1/nouveau_pushbuf.c
new file mode 100644
index 0000000..59f60d9
--- /dev/null
+++ b/nouveau-1/nouveau_pushbuf.c
@@ -0,0 +1,344 @@
+/*
+ * Copyright
+ * 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
+ * FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */

```

```

+
+#include <stdio.h>
+#include <stdlib.h>
+#include <errno.h>
+#include <assert.h>
+
+#include "nouveau_private.h"
+
+#define PB_BUFMGR_DWORDS (4096 / 2)
+#define PB_MIN_USER_DWORDS 2048
+
+static int
+nouveau_pushbuf_space(struct nouveau_channel *chan, unsigned min)
+{
+ struct nouveau_channel_priv *nvchan = nouveau_channel(chan);
+ struct nouveau_pushbuf_priv *nvpb = &nvchan->pb;
+ struct nouveau_bo *bo;
+ int ret;
+
+ if (min < PB_MIN_USER_DWORDS)
+ min = PB_MIN_USER_DWORDS;
+
+ nvpb->current_offset = chan->cur - nvpb->pushbuf;
+ if (chan->cur + min + 2 <= chan->end)
+ return 0;
+
+ nvpb->current++;
+ if (nvpb->current == CALPB_BUFFERS)
+ nvpb->current = 0;
+ bo = nvpb->buffer[nvpb->current];
+
+ ret = nouveau_bo_map(bo, NOUVEAU_BO_WR);
+ if (ret)
+ return ret;
+
+ nvpb->size = (bo->size - 8) / 4;
+ nvpb->pushbuf = bo->map;
+ nvpb->current_offset = 0;
+
+ chan->cur = nvpb->pushbuf;
+ chan->end
+ = nvpb->pushbuf + nvpb->size;
+
+ nouveau_bo_unmap(bo);
+ return 0;
+}
+
+static void

```



```

+nouveau_pushbuf_fini_call(struct nouveau_channel *chan)
+{
+ struct nouveau_channel_priv *nvchan = nouveau_channel(chan);
+ struct nouveau_pushbuf_priv *nvpb = &nvchan->pb;
+ int i;
+
+ for (i = 0; i < CALPB_BUFFERS; i++)
+  nouveau_bo_ref(NULL, &nvpb->buffer[i]);
+ nvpb->pushbuf = NULL;
+}
+
+static int
+nouveau_pushbuf_init_call(struct nouveau_channel *chan, int buf_size)
+{
+ struct drm_nouveau_gem_pushbuf req;
+ struct nouveau_channel_priv *nvchan = nouveau_channel(chan);
+ struct nouveau_pushbuf_priv *nvpb = &nvchan->pb;
+ struct nouveau_device *dev = chan->device;
+ uint32_t flags = 0;
+ int i, ret;
+
+ if (nvchan->drm.pushbuf_domains & NOUVEAU_GEM_DOMAIN_GART)
+  flags |= NOUVEAU_BO_GART;
+ else
+  flags |= NOUVEAU_BO_VRAM;
+
+ req.channel = chan->id;
+ req.nr_push = 0;
+ ret = drmCommandWriteRead(nouveau_device(dev)->fd,
+  DRM_NOUVEAU_GEM_PUSHBUF, &req, sizeof(req));
+ if
+  (ret)
+  return ret;
+
+ for (i = 0; i < CALPB_BUFFERS; i++) {
+  ret = nouveau_bo_new(dev, flags | NOUVEAU_BO_MAP,
+   0, buf_size, &nvpb->buffer[i]);
+  if (ret) {
+   nouveau_pushbuf_fini_call(chan);
+   return ret;
+  }
+ }
+
+ nvpb->cal_suffix0 = req.suffix0;
+ nvpb->cal_suffix1 = req.suffix1;
+ return 0;
+}
+

```

```

+int
+nouveau_pushbuf_init(struct nouveau_channel *chan, int buf_size)
+{
+ struct nouveau_channel_priv *nvchan = nouveau_channel(chan);
+ struct nouveau_pushbuf_priv *nvpb = &nvchan->pb;
+ int ret;
+
+
+ ret = nouveau_pushbuf_init_call(chan, buf_size);
+ if (ret)
+ return ret;
+
+
+ ret = nouveau_pushbuf_space(chan, 0);
+ if (ret)
+ return ret;
+
+
+ nvpb->buffers = calloc(NOUVEAU_GEM_MAX_BUFFERS,
+ sizeof(struct drm_nouveau_gem_pushbuf_bo));
+ nvpb->relocs = calloc(NOUVEAU_GEM_MAX_RELOCS,
+ sizeof(struct drm_nouveau_gem_pushbuf_reloc));
+ return 0;
+}
+
+void
+nouveau_pushbuf_fini(struct nouveau_channel *chan)
+{
+ struct nouveau_channel_priv *nvchan
+ = nouveau_channel(chan);
+ struct nouveau_pushbuf_priv *nvpb = &nvchan->pb;
+ nouveau_pushbuf_fini_call(chan);
+ free(nvpb->buffers);
+ free(nvpb->relocs);
+}
+
+static int
+nouveau_pushbuf_bo_add(struct nouveau_channel *chan, struct nouveau_bo *bo,
+ unsigned offset, unsigned length)
+{
+ struct nouveau_channel_priv *nvchan = nouveau_channel(chan);
+ struct nouveau_pushbuf_priv *nvpb = &nvchan->pb;
+ struct drm_nouveau_gem_pushbuf_push *p = &nvpb->push[nvpb->nr_push++];
+ struct drm_nouveau_gem_pushbuf_bo *pbbo;
+ struct nouveau_bo_priv *nvbo = nouveau_bo(bo);
+
+
+ pbbo = nouveau_bo_emit_buffer(chan, bo);
+ if (!pbbo)
+ return -ENOMEM;
+ pbbo->valid_domains &= nvchan->drm.pushbuf_domains;
+ pbbo->read_domains |= nvchan->drm.pushbuf_domains;

```

```

+ nvbo->pending_refcnt++;
+
+ p->bo_index = pbbo - nvpb->buffers;
+ p->offset = offset;
+ p->length = length;
+ return 0;
+ }
+
+int
+nouveau_pushbuf_submit(struct nouveau_channel *chan, struct nouveau_bo *bo,
+    unsigned offset,
+    unsigned length)
+{
+ struct nouveau_pushbuf_priv *nvpb = &nouveau_channel(chan)->pb;
+ int ret, len;
+
+ if ((AVAIL_RING(chan) + nvpb->current_offset) != nvpb->size) {
+ if (nvpb->cal_suffix0 || nvpb->cal_suffix1) {
+ *(chan->cur++) = nvpb->cal_suffix0;
+ *(chan->cur++) = nvpb->cal_suffix1;
+ }
+
+ len = (chan->cur - nvpb->pushbuf) - nvpb->current_offset;
+
+ ret = nouveau_pushbuf_bo_add(chan, nvpb->buffer[nvpb->current],
+    nvpb->current_offset * 4, len * 4);
+ if (ret)
+ return ret;
+
+ nvpb->current_offset += len;
+ }
+
+ return bo ? nouveau_pushbuf_bo_add(chan, bo, offset, length) : 0;
+}
+
+static void
+nouveau_pushbuf_bo_unref(struct nouveau_pushbuf_priv *nvpb, int index)
+{
+ struct drm_nouveau_gem_pushbuf_bo *pbbo = &nvpb->buffers[index];
+ struct nouveau_bo *bo = (void *) (unsigned long) pbbo->user_priv;
+ struct nouveau_bo_priv *nvbo = nouveau_bo(bo);
+
+ if (--nvbo->pending_refcnt)
+ return;
+
+ if (pbbo->presumed.valid == 0) {
+ nvbo->domain = pbbo->presumed.domain;
+ nvbo->offset

```

```

= pbbo->presumed.offset;
+ }
+
+ nvbo->pending = NULL;
+ nouveau_bo_ref(NULL, &bo);
+
+ /* we only ever remove from the tail of the pending lists,
+ * so this is safe.
+ */
+ nvpb->nr_buffers--;
+}
+
+int
+nouveau_pushbuf_flush(struct nouveau_channel *chan, unsigned min)
+{
+ struct nouveau_device_priv *nvdev = nouveau_device(chan->device);
+ struct nouveau_channel_priv *nvchan = nouveau_channel(chan);
+ struct nouveau_pushbuf_priv *nvpb = &nvchan->pb;
+ struct drm_nouveau_gem_pushbuf req;
+ unsigned i;
+ int ret;
+
+ ret = nouveau_pushbuf_submit(chan, NULL, 0, 0);
+ if (ret)
+ return ret;
+
+ if (!nvpb->nr_push)
+ return 0;
+
+ req.channel = chan->id;
+ req.nr_push = nvpb->nr_push;
+ req.push = (uint64_t)(unsigned long)nvpb->push;
+ req.nr_buffers = nvpb->nr_buffers;
+ req.buffers = (uint64_t)(unsigned long)nvpb->buffers;
+ req.nr_relocs = nvpb->nr_relocs;
+ req.relocs = (uint64_t)(unsigned long)nvpb->relocs;
+ req.suffix0 = nvpb->cal_suffix0;
+ req.suffix1
+ = nvpb->cal_suffix1;
+
+ do {
+ ret = drmCommandWriteRead(nvdev->fd, DRM_NOUVEAU_GEM_PUSHBUF,
+ &req, sizeof(req));
+ } while (ret == -EAGAIN);
+ nvpb->cal_suffix0 = req.suffix0;
+ nvpb->cal_suffix1 = req.suffix1;
+ nvdev->base.vm_vram_size = req.vram_available;
+ nvdev->base.vm_gart_size = req.gart_available;

```

```

+
+ /* Update presumed offset/domain for any buffers that moved.
+ * Dereference all buffers on validate list
+ */
+ for (i = 0; i < nvpb->nr_relocs; i++) {
+ nouveau_pushbuf_bo_unref(nvpb, nvpb->relocs[i].bo_index);
+ nouveau_pushbuf_bo_unref(nvpb, nvpb->relocs[i].reloc_bo_index);
+ }
+
+ for (i = 0; i < nvpb->nr_push; i++)
+ nouveau_pushbuf_bo_unref(nvpb, nvpb->push[i].bo_index);
+
+ nvpb->nr_buffers = 0;
+ nvpb->nr_relocs = 0;
+ nvpb->nr_push = 0;
+
+ /* Allocate space for next push buffer */
+ if (nouveau_pushbuf_space(chan, min))
+ assert(0);
+
+ if (chan->flush_notify)
+ chan->flush_notify(chan);
+
+ nvpb->marker = NULL;
+ return ret;
+}
+
+int
+nouveau_pushbuf_marker_emit(struct
nouveau_channel *chan,
+ unsigned wait_dwords, unsigned wait_relocs)
+{
+ struct nouveau_pushbuf_priv *nvpb = &nouveau_channel(chan)->pb;
+
+ if (AVAIL_RING(chan) < wait_dwords)
+ return nouveau_pushbuf_flush(chan, wait_dwords);
+
+ if (nvpb->nr_relocs + wait_relocs >= NOUVEAU_GEM_MAX_RELOCS)
+ return nouveau_pushbuf_flush(chan, wait_dwords);
+
+ nvpb->marker = chan->cur;
+ nvpb->marker_offset = nvpb->current_offset;
+ nvpb->marker_push = nvpb->nr_push;
+ nvpb->marker_relocs = nvpb->nr_relocs;
+ return 0;
+}
+
+void

```

```

+nouveau_pushbuf_marker_undo(struct nouveau_channel *chan)
+{
+ struct nouveau_pushbuf_priv *nvpb = &nouveau_channel(chan)->pb;
+ unsigned i;
+
+ if (!nvpb->marker)
+ return;
+
+ /* undo any relocs/buffers added to the list since last marker */
+ for (i = nvpb->marker_relocs; i < nvpb->nr_relocs; i++) {
+ nouveau_pushbuf_bo_unref(nvpb, nvpb->relocs[i].bo_index);
+ nouveau_pushbuf_bo_unref(nvpb, nvpb->relocs[i].reloc_bo_index);
+ }
+ nvpb->nr_relocs
+ = nvpb->marker_relocs;
+
+ for (i = nvpb->marker_push; i < nvpb->nr_push; i++)
+ nouveau_pushbuf_bo_unref(nvpb, nvpb->push[i].bo_index);
+ nvpb->nr_push = nvpb->marker_push;
+
+ /* reset pushbuf back to last marker */
+ chan->cur = nvpb->marker;
+ nvpb->current_offset = nvpb->marker_offset;
+ nvpb->marker = NULL;
+ }
+
+int
+nouveau_pushbuf_emit_reloc(struct nouveau_channel *chan, void *ptr,
+ struct nouveau_bo *bo, uint32_t data, uint32_t data2,
+ uint32_t flags, uint32_t vor, uint32_t tor)
+{
+ struct nouveau_pushbuf_priv *nvpb = &nouveau_channel(chan)->pb;
+ int ret;
+
+ ret = nouveau_reloc_emit(chan, nvpb->buffer[nvpb->current],
+ (char *)ptr - (char *)nvpb->pushbuf, ptr,
+ bo, data, data2, flags, vor, tor);
+ if (ret)
+ return ret;
+
+ return 0;
+ }
+
diff --git a/nouveau-1/nouveau_pushbuf.h b/nouveau-1/nouveau_pushbuf.h
new file mode 100644
index 0000000..2a98789
--- /dev/null
+++ b/nouveau-1/nouveau_pushbuf.h

```

@@ -0,0 +1,162 @@

+/*

+ * Copyright

2007 Nouveau Project

+ *

+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:

+ *

+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.

+ *

+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT
+ * OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.

+ */

+

```
+#ifndef __NOUVEAU_PUSHBUF_H__
```

```
+#define __NOUVEAU_PUSHBUF_H__
```

+

```
+#include <assert.h>
```

```
+#include <string.h>
```

+

```
+#include "nouveau_bo.h"
```

```
+#include "nouveau_grobj.h"
```

+

```
+int
```

```
+nouveau_pushbuf_flush(struct nouveau_channel *, unsigned min);
```

+

```
+int
```

```
+nouveau_pushbuf_marker_emit(struct nouveau_channel *chan,
```

```
+ unsigned wait_dwords, unsigned wait_relocs);
```

+

```
+void
```

```
+nouveau_pushbuf_marker_undo(struct nouveau_channel *chan);
```

+

```
+int
```

```
+nouveau_pushbuf_emit_reloc(struct nouveau_channel *, void *ptr,
```

```
+ struct nouveau_bo *, uint32_t data, uint32_t data2,
```

```
+ uint32_t flags, uint32_t vor, uint32_t tor);
```

```

+
+int
+nouveau_pushbuf_submit(struct nouveau_channel *chan, struct nouveau_bo *bo,
+    unsigned offset, unsigned length);
+
+/* Push buffer access macros */
+static __inline__ int
+MARK_RING(struct nouveau_channel *chan, unsigned dwords, unsigned relocs)
+{
+    return nouveau_pushbuf_marker_emit(chan,
+        dwords, relocs);
+}
+
+static __inline__ void
+MARK_UNDO(struct nouveau_channel *chan)
+{
+    nouveau_pushbuf_marker_undo(chan);
+}
+
+static __inline__ void
+OUT_RING(struct nouveau_channel *chan, unsigned data)
+{
+    *(chan->cur++) = (data);
+}
+
+static __inline__ void
+OUT_RINGp(struct nouveau_channel *chan, const void *data, unsigned size)
+{
+    memcpy(chan->cur, data, size * 4);
+    chan->cur += size;
+}
+
+static __inline__ void
+OUT_RINGf(struct nouveau_channel *chan, float f)
+{
+    union { uint32_t i; float f; } c;
+    c.f = f;
+    OUT_RING(chan, c.i);
+}
+
+static __inline__ unsigned
+AVAIL_RING(struct nouveau_channel *chan)
+{
+    return chan->end - chan->cur;
+}
+
+static __inline__ void
+WAIT_RING(struct nouveau_channel *chan, unsigned size)

```



```

+{
+ if (chan->cur + size > chan->end)
+ nouveau_pushbuf_flush(chan, size);
+}
+
+static __inline__ void
+FIRE_RING(struct nouveau_channel *chan)
+{
+ nouveau_pushbuf_flush(chan, 0);
+}
+
+static __inline__ int
+OUT_RELOC(struct nouveau_channel
+ *chan, struct nouveau_bo *bo,
+ unsigned data, unsigned flags, unsigned vor, unsigned tor)
+{
+ return nouveau_pushbuf_emit_reloc(chan, chan->cur++, bo,
+ data, 0, flags, vor, tor);
+}
+
+static __inline__ int
+OUT_RELOC2(struct nouveau_channel *chan, struct nouveau_bo *bo,
+ unsigned data, unsigned data2, unsigned flags,
+ unsigned vor, unsigned tor)
+{
+ return nouveau_pushbuf_emit_reloc(chan, chan->cur++, bo,
+ data, data2, flags, vor, tor);
+}
+
+/* Raw data + flags depending on FB/TT buffer */
+static __inline__ int
+OUT_RELOCd(struct nouveau_channel *chan, struct nouveau_bo *bo,
+ unsigned data, unsigned flags, unsigned vor, unsigned tor)
+{
+ return OUT_RELOC(chan, bo, data, flags | NOUVEAU_BO_OR, vor, tor);
+}
+
+/* FB/TT object handle */
+static __inline__ int
+OUT_RELOCo(struct nouveau_channel *chan, struct nouveau_bo *bo,
+ unsigned flags)
+{
+ return OUT_RELOC(chan, bo, 0, flags | NOUVEAU_BO_OR,
+ chan->vram->handle, chan->gart->handle);
+}
+
+/*

```

```

Low 32-bits of offset */
+static __inline__ int
+OUT_RELOC1(struct nouveau_channel *chan, struct nouveau_bo *bo,
+ unsigned delta, unsigned flags)
+{
+ return OUT_RELOC(chan, bo, delta, flags | NOUVEAU_BO_LOW, 0, 0);
+}
+
+/* Low 32-bits of offset + GPU linear access range info */
+static __inline__ int
+OUT_RELOCr(struct nouveau_channel *chan, struct nouveau_bo *bo,
+ unsigned delta, unsigned size, unsigned flags)
+{
+ return OUT_RELOC2(chan, bo, delta, size, flags | NOUVEAU_BO_LOW, 0, 0);
+}
+
+/* High 32-bits of offset */
+static __inline__ int
+OUT_RELOC2(struct nouveau_channel *chan, struct nouveau_bo *bo,
+ unsigned delta, unsigned flags)
+{
+ return OUT_RELOC(chan, bo, delta, flags | NOUVEAU_BO_HIGH, 0, 0);
+}
+
+#endif
diff --git a/nouveau-1/nouveau_reloc.c b/nouveau-1/nouveau_reloc.c
new file mode 100644
index 0000000..cd219db
--- /dev/null
+++ b/nouveau-1/nouveau_reloc.c
@@ -0,0 +1,154 @@
+/*
+ * Copyright 2010 Nouveau Project
+ *
+ * Permission is hereby
+ granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL

```

```

+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE
+ * USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#include <stdio.h>
+#include <stdlib.h>
+#include <errno.h>
+#include <assert.h>
+
+#include "nouveau_private.h"
+
+static uint32_t
+nouveau_reloc_calc(struct drm_nouveau_gem_pushbuf_bo *pbbo,
+ struct drm_nouveau_gem_pushbuf_reloc *r)
+{
+ uint32_t push = 0;
+
+ if (r->flags & NOUVEAU_GEM_RELOC_LOW)
+ push = (pbbo->presumed.offset + r->data);
+ else
+ if (r->flags & NOUVEAU_GEM_RELOC_HIGH)
+ push = (pbbo->presumed.offset + r->data) >> 32;
+ else
+ push = r->data;
+
+ if (r->flags & NOUVEAU_GEM_RELOC_OR) {
+ if (pbbo->presumed.domain & NOUVEAU_GEM_DOMAIN_VRAM)
+ push |= r->vor;
+ else
+ push |= r->tor;
+ }
+
+ return push;
+}
+
+int
+nouveau_reloc_emit(struct nouveau_channel *chan, struct nouveau_bo *reloc_bo,
+ uint32_t reloc_offset, uint32_t *reloc_ptr,
+ struct nouveau_bo *bo, uint32_t data, uint32_t data2,
+ uint32_t flags, uint32_t vor, uint32_t tor)
+{
+ struct nouveau_pushbuf_priv *nvpb = &nouveau_channel(chan)->pb;
+ struct
+ nouveau_bo_priv *nvbo = nouveau_bo(bo);
+ struct drm_nouveau_gem_pushbuf_reloc *r;

```

```

+ struct drm_nouveau_gem_pushbuf_bo *pbbo, *rpbbo;
+ uint32_t domains = 0;
+
+ if (nvpb->nr_relocs >= NOUVEAU_GEM_MAX_RELOCS) {
+   fprintf(stderr, "too many relocs!!\n");
+   return -ENOMEM;
+ }
+
+ if (nvbo->user && (flags & NOUVEAU_BO_WR)) {
+   fprintf(stderr, "write to user buffer!!\n");
+   return -EINVAL;
+ }
+
+ /* We're about to reloc a user buffer, better make sure we don't cause
+  * a double migration.
+  */
+ if (!(nvbo->flags & (NOUVEAU_BO_GART | NOUVEAU_BO_VRAM)))
+   nvbo->flags |= (flags & (NOUVEAU_BO_GART | NOUVEAU_BO_VRAM));
+
+ /* add buffer to validation list */
+ pbbo = nouveau_bo_emit_buffer(chan, bo);
+ if (!pbbo) {
+   fprintf(stderr, "buffer emit fail :(\n");
+   return -ENOMEM;
+ }
+ nouveau_bo(bo)->pending_refcnt++;
+
+ if (flags & (NOUVEAU_BO_VRAM | NOUVEAU_BO_GART)) {
+   if (flags & NOUVEAU_BO_VRAM)
+     domains |= NOUVEAU_GEM_DOMAIN_VRAM;
+   if (flags & NOUVEAU_BO_GART)
+     domains
+     |= NOUVEAU_GEM_DOMAIN_GART;
+ } else
+   domains |= nvbo->domain;
+
+ if (!(pbbo->valid_domains & domains)) {
+   fprintf(stderr, "no valid domains remain!\n");
+   return -EINVAL;
+ }
+ pbbo->valid_domains &= domains;
+
+ assert(flags & NOUVEAU_BO_RDWR);
+ if (flags & NOUVEAU_BO_RD) {
+   pbbo->read_domains |= domains;
+ }
+
+ if (flags & NOUVEAU_BO_WR) {
+   pbbo->write_domains |= domains;

```

```

+ nvbo->write_marker = 1;
+ }
+
+ /* nvc0 gallium driver uses reloc_emit() with NULL target buffer
+ * to inform bufmgr of a buffer's use - however, we need something
+ * to track, so create a reloc for now, and hope it never triggers
+ * (it shouldn't, constant virtual address..)
+ */
+ if (!reloc_bo) {
+   reloc_bo = nvpb->buffer[nvpb->current];
+   reloc_offset = 0;
+   reloc_ptr = NULL;
+ }
+
+ /* add reloc target bo to validation list, and create the reloc */
+ rpbbo = nouveau_bo_emit_buffer(chan, reloc_bo);
+ if (!rpbbo)
+   return -ENOMEM;
+ nouveau_bo(reloc_bo)->pending_refcnt++;
+
+ r
+   = nvpb->relocs + nvpb->nr_relocs++;
+ r->reloc_bo_index = rpbbo - nvpb->buffers;
+ r->reloc_bo_offset = reloc_offset;
+ r->bo_index = pbbo - nvpb->buffers;
+ r->flags = 0;
+ if (flags & NOUVEAU_BO_LOW)
+   r->flags |= NOUVEAU_GEM_RELOC_LOW;
+ if (flags & NOUVEAU_BO_HIGH)
+   r->flags |= NOUVEAU_GEM_RELOC_HIGH;
+ if (flags & NOUVEAU_BO_OR)
+   r->flags |= NOUVEAU_GEM_RELOC_OR;
+ r->data = data;
+ r->vor = vor;
+ r->tor = tor;
+
+ if (reloc_ptr) {
+   if (flags & NOUVEAU_BO_DUMMY)
+     *reloc_ptr = 0;
+   else
+     *reloc_ptr = nouveau_reloc_calc(pbbo, r);
+ }
+
+ return 0;
+ }
+
diff --git a/nouveau-1/nouveau_reloc.h b/nouveau-1/nouveau_reloc.h
new file mode 100644

```

```

index 0000000..24ddb52
--- /dev/null
+++ b/nouveau-1/nouveau_reloc.h
@@ -0,0 +1,32 @@
+/*
+ * Copyright 2010 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without
+ * restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#ifndef __NOUVEAU_RELOC_H__
+#define __NOUVEAU_RELOC_H__
+
+int
+nouveau_reloc_emit(struct nouveau_channel *chan,
+ struct nouveau_bo *reloc_bo,
+ uint32_t reloc_offset, uint32_t *reloc_ptr,
+ struct nouveau_bo *bo, uint32_t data, uint32_t data2,
+ uint32_t flags, uint32_t vor, uint32_t tor);
+
+#endif
diff --git a/nouveau-1/nouveau_resource.c b/nouveau-1/nouveau_resource.c
new file mode 100644
index 0000000..7acaf7d
--- /dev/null
+++ b/nouveau-1/nouveau_resource.c
@@ -0,0 +1,124 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a

```

```

+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial
portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#include <stdlib.h>
+#include <errno.h>
+
+#include "nouveau_private.h"
+
+int
+nouveau_resource_init(struct nouveau_resource **heap,
+    unsigned start, unsigned size)
+{
+    struct nouveau_resource *r;
+
+    r = calloc(1, sizeof(struct nouveau_resource));
+    if (!r)
+        return 1;
+
+    r->start = start;
+    r->size = size;
+    *heap = r;
+    return 0;
+}
+
+void
+nouveau_resource_destroy(struct nouveau_resource **heap)
+{
+    if (!*heap)
+        return;
+    free(*heap);
+    *heap = NULL;
+}

```

```

+
+int
+nouveau_resource_alloc(struct
nouveau_resource *heap, unsigned size, void *priv,
+ struct nouveau_resource **res)
+{
+ struct nouveau_resource *r;
+
+ if (!heap || !size || !res || *res)
+ return 1;
+
+ while (heap) {
+ if (!heap->in_use && heap->size >= size) {
+ r = calloc(1, sizeof(struct nouveau_resource));
+ if (!r)
+ return 1;
+
+ r->start = (heap->start + heap->size) - size;
+ r->size = size;
+ r->in_use = 1;
+ r->priv = priv;
+
+ heap->size -= size;
+
+ r->next = heap->next;
+ if (heap->next)
+ heap->next->prev = r;
+ r->prev = heap;
+ heap->next = r;
+
+ *res = r;
+ return 0;
+ }
+
+ heap = heap->next;
+ }
+
+ return 1;
+}
+
+void
+nouveau_resource_free(struct nouveau_resource **res)
+{
+ struct nouveau_resource *r;
+
+ if (!res || !*res)
+ return;
+ r = *res;

```



```

+ *res = NULL;
+
+ r->in_use = 0;
+
+ if (r->next && !r->next->in_use) {
+ struct nouveau_resource *new = r->next;
+
+ new->prev = r->prev;
+ if (r->prev)
+ r->prev->next
+ = new;
+ new->size += r->size;
+ new->start = r->start;
+
+ free(r);
+ r = new;
+ }
+
+ if (r->prev && !r->prev->in_use) {
+ r->prev->next = r->next;
+ if (r->next)
+ r->next->prev = r->prev;
+ r->prev->size += r->size;
+ free(r);
+ }
+
+ }
diff --git a/nouveau-1/nouveau_resource.h b/nouveau-1/nouveau_resource.h
new file mode 100644
index 0000000..b760dfb
--- /dev/null
+++ b/nouveau-1/nouveau_resource.h
@@ -0,0 +1,51 @@
+/*
+ * Copyright 2007 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall
+ * be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

```

```
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,  
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL  
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,  
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF  
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE  
+ * SOFTWARE.
```

```
+ */
```

```
+
```

```
+#ifndef __NOUVEAU_RESOURCE_H__
```

```
+#define __NOUVEAU_RESOURCE_H__
```

```
+
```

```
+struct nouveau_resource {
```

```
+ struct nouveau_resource *prev;
```

```
+ struct nouveau_resource *next;
```

```
+
```

```
+ int in_use;
```

```
+ void *priv;
```

```
+
```

```
+ unsigned int start;
```

```
+ unsigned int size;
```

```
+};
```

```
+
```

```
+int
```

```
+nouveau_resource_init(struct nouveau_resource **heap, unsigned start,
```

```
+ unsigned size);
```

```
+
```

```
+void
```

```
+nouveau_resource_destroy(struct nouveau_resource **heap);
```

```
+
```

```
+int
```

```
+nouveau_resource_alloc(struct
```

```
 nouveau_resource *heap, unsigned size, void *priv,
```

```
+ struct nouveau_resource **);
```

```
+
```

```
+void
```

```
+nouveau_resource_free(struct nouveau_resource **);
```

```
+
```

```
+#endif
```

```
diff --git a/nouveau-1/nv04_pushbuf.h b/nouveau-1/nv04_pushbuf.h
```

```
new file mode 100644
```

```
index 0000000..586b284
```

```
--- /dev/null
```

```
+++ b/nouveau-1/nv04_pushbuf.h
```

```
@@ -0,0 +1,66 @@
```

```
+/*
```

```
+ * Copyright 2007 Nouveau Project
```

```
+ *
```

```
+ * Permission is hereby granted, free of charge, to any person obtaining a
```

```

+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED
+ * "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#ifndef __NV04_PUSHBUF_H__
+#define __NV04_PUSHBUF_H__
+
+#include "nouveau_pushbuf.h"
+
+static __inline__ void
+BEGIN_RING(struct nouveau_channel *chan, struct nouveau_grobject *gr,
+ unsigned mthd, unsigned size)
+{
+ if (gr->bound == NOUVEAU_GROBJECT_UNBOUND)
+ nouveau_grobject_autobind(gr);
+ chan->subc[gr->subc].sequence = chan->subc_sequence++;
+
+ WAIT_RING(chan, size + 1);
+ OUT_RING(chan, (gr->subc << 13) | (size << 18) | mthd);
+}
+
+/* non-incrementing BEGIN_RING */
+static __inline__ void
+BEGIN_RING_NI(struct nouveau_channel *chan,
+ struct nouveau_grobject *gr,
+ unsigned mthd, unsigned size)
+{
+ BEGIN_RING(chan, gr, mthd | 0x40000000, size);
+}
+
+static __inline__ void
+BIND_RING(struct nouveau_channel *chan, struct nouveau_grobject *gr, unsigned sc)
+{

```

```

+ struct nouveau_subchannel *subc = &gr->channel->subc[sc];
+
+ if (subc->gr) {
+ if (subc->gr->bound == NOUVEAU_GROBJ_BOUND_EXPLICIT)
+ assert(0);
+ subc->gr->bound = NOUVEAU_GROBJ_UNBOUND;
+ }
+ subc->gr = gr;
+ subc->gr->subc = sc;
+ subc->gr->bound = NOUVEAU_GROBJ_BOUND_EXPLICIT;
+
+ BEGIN_RING(chan, gr, 0x0000, 1);
+ OUT_RING (chan, gr->handle);
+}
+
+#endif
diff --git a/nouveau-1/nvc0_pushbuf.h b/nouveau-1/nvc0_pushbuf.h
new file mode 100644
index 0000000..40dc7e6
--- /dev/null
+++ b/nouveau-1/nvc0_pushbuf.h
@@ -0,0 +1,92 @@
+/*
+ * Copyright 2010 Nouveau Project
+ *
+ * Permission is hereby granted, free of charge, to any person obtaining a
+ * copy of this software and associated documentation files (the "Software"),
+ * to deal in the Software without
+ * restriction, including without limitation
+ * the rights to use, copy, modify, merge, publish, distribute, sublicense,
+ * and/or sell copies of the Software, and to permit persons to whom the
+ * Software is furnished to do so, subject to the following conditions:
+ *
+ * The above copyright notice and this permission notice shall be included in
+ * all copies or substantial portions of the Software.
+ *
+ * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
+ * IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
+ * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
+ * THE AUTHORS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY,
+ * WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF
+ * OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
+ * SOFTWARE.
+ */
+
+#ifndef __NVC0_PUSHBUF_H__
+#define __NVC0_PUSHBUF_H__
+

```

```

#include "nouveau_pushbuf.h"
+
#define SUBC_BIND(chan,
gr) do {
+ if (gr->bound == NOUVEAU_GROBJ_UNBOUND)
+ nouveau_grobj_autobind(gr);
+ chan->subc[gr->subc].sequence = chan->subc_sequence++;
+} while (0)
+
+/* incremental methods */
+static __inline__ void
+BEGIN_RING(struct nouveau_channel *chan, struct nouveau_grobj *gr,
+ unsigned mthd, unsigned size)
+{
+ SUBC_BIND(chan, gr);
+ WAIT_RING(chan, size + 1);
+ OUT_RING (chan, (0x2 << 28) | (size << 16) | (gr->subc << 13) | (mthd >> 2));
+}
+
+/* non-incremental */
+static __inline__ void
+BEGIN_RING_NI(struct nouveau_channel *chan, struct nouveau_grobj *gr,
+ unsigned mthd, unsigned size)
+{
+ SUBC_BIND(chan, gr);
+ WAIT_RING(chan, size + 1);
+ OUT_RING (chan, (0x6 << 28) | (size << 16) | (gr->subc << 13) | (mthd >> 2));
+}
+
+/* increment-once */
+static __inline__ void
+BEGIN_RING_1I(struct nouveau_channel *chan, struct nouveau_grobj *gr,
+ unsigned mthd, unsigned size)
+{
+ SUBC_BIND(chan, gr);
+ WAIT_RING(chan, size + 1);
+ OUT_RING (chan, (0xa << 28) | (size << 16) | (gr->subc << 13) | (mthd >> 2));
+}
+
+/* inline-data */
+static __inline__ void
+IMMED_RING(struct nouveau_channel *chan, struct nouveau_grobj *gr,
+ unsigned mthd, unsigned data)
+{
+ SUBC_BIND(chan, gr);
+ WAIT_RING(chan, 1);
+ OUT_RING (chan, (0x8 << 28) | (data << 16) | (gr->subc << 13) | (mthd >> 2));

```

```

+}
+
+static __inline__ void
+BIND_RING(struct nouveau_channel *chan, struct nouveau_grobj *gr, unsigned sc)
+{
+ struct nouveau_subchannel *subc = &gr->channel->subc[sc];
+
+
+ if (subc->gr) {
+ if (subc->gr->bound == NOUVEAU_GROBJ_BOUND_EXPLICIT)
+ assert(0);
+ subc->gr->bound = NOUVEAU_GROBJ_UNBOUND;
+ }
+ subc->gr = gr;
+ subc->gr->subc = sc;
+ subc->gr->bound = NOUVEAU_GROBJ_BOUND_EXPLICIT;
+
+
+ BEGIN_RING(chan, gr, 0x0000, 1);
+ OUT_RING (chan, gr->grclass);
+}
+
+#endif
diff --git a/nouveau/Makefile.am b/nouveau/Makefile.am
index 206e892..f21157e
100644
--- a/nouveau/Makefile.am
+++ b/nouveau/Makefile.am
@@ -6,20 +6,20 @@ AM_CFLAGS = \
-I$(top_srcdir)/include/drm \
-DDEBUG

-libdrm_nouveau_la_LTLIBRARIES = libdrm_nouveau.la
-libdrm_nouveau_ladir = $(libdir)
-libdrm_nouveau_la_LDFLAGS = -version-number 2:0:0 -no-undefined
-libdrm_nouveau_la_LIBADD = ../libdrm.la @PTHREADSTUBS_LIBS@
+libdrm_nouveau2_la_LTLIBRARIES = libdrm_nouveau2.la
+libdrm_nouveau2_ladir = $(libdir)
+libdrm_nouveau2_la_LDFLAGS = -version-number 2:0:0 -no-undefined
+libdrm_nouveau2_la_LIBADD = ../libdrm.la @PTHREADSTUBS_LIBS@

-libdrm_nouveau_la_SOURCES = nouveau.c \
- pushbuf.c \
- bufctx.c \
- abi16.c \
- private.h
+libdrm_nouveau2_la_SOURCES = nouveau.c \
+ pushbuf.c \
+ bufctx.c \
+ abi16.c \

```

+ private.h

libdrm_nouveauintelincludedir = \${includedir}/libdrm

libdrm_nouveauintelinclude_HEADERS = nouveau.h

pkgconfigdir = @pkgconfigdir@

-pkgconfig_DATA = libdrm_nouveau.pc

+pkgconfig_DATA = libdrm_nouveau2.pc

diff

--git a/nouveau/libdrm_nouveau.pc.in b/nouveau/libdrm_nouveau.pc.in

deleted file mode 100644

index 6170613..0000000

--- a/nouveau/libdrm_nouveau.pc.in

+++ /dev/null

@@ -1,11 +0,0 @@

-prefix=@prefix@

-exec_prefix=@exec_prefix@

-libdir=@libdir@

-includedir=@includedir@

-

-Name: libdrm_nouveau

-Description: Userspace interface to nouveau kernel DRM services

-Version: 2.4.33

-Libs: -L\${libdir} -ldrm_nouveau

-Cflags: -I\${includedir} -I\${includedir}/libdrm -I\${includedir}/nouveau

-Requires.private: libdrm

diff --git a/nouveau/libdrm_nouveau2.pc.in b/nouveau/libdrm_nouveau2.pc.in

new file mode 100644

index 0000000..36971e8

--- /dev/null

+++ b/nouveau/libdrm_nouveau2.pc.in

@@ -0,0 +1,11 @@

+prefix=@prefix@

+exec_prefix=@exec_prefix@

+libdir=@libdir@

+includedir=@includedir@

+

+Name: libdrm_nouveau2

+Description: Userspace interface to nouveau kernel DRM services

+Version: 2.4.33

+Libs: -L\${libdir} -ldrm_nouveau2

+Cflags: -I\${includedir} -I\${includedir}/libdrm

+Requires.private:

libdrm

--

1.7.10.2

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.37-nouveau-1.patch

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2007 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS
* BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*

* Authors:

* Eric Anholt <eric@anholt.net>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/getstats.c

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/updatedraw.c

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/getversion.c

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_bufmgr.c

*

/opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/getclient.c

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/setversion.c

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-

gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/openclose.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/drmtest.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/drmtest.h
No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 2007-2008 Tungsten Graphics, Inc., Cedar Park, Texas.
* Copyright (c) 2007-2008 Dave Airlie <airlied@linux.ie>
* Copyright (c) 2007-2008 Jakob Bornecrantz <wallbraker@gmail.com>
*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice shall be included in
* all copies or substantial portions of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF
* MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE
* AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86drmMode.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86drmMode.c

No license file was found, but licenses were detected in source scan.

/*

*

* Copyright 2003 Tungsten Graphics, Inc., Cedar Park, Texas.
* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including

* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:

*

* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
* OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF
* MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT.
* IN NO EVENT SHALL TUNGSTEN GRAPHICS AND/OR ITS SUPPLIERS BE LIABLE FOR
* ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT,
* TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE
* SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_chipset.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2008 Dave Airlie
* Copyright © 2008 Jérôme Glisse
* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining
* a copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
* EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES
* OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND
* NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS, AUTHORS
* AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT,
* TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.

*

* The above copyright notice and this permission notice (including the

* next paragraph) shall be included in all copies or substantial portions
* of the Software.
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_bo_gem.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_bo_gem.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_bo.c
No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2011 Red Hat All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining
* a copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
* EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES
* OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND
* NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS, AUTHORS
* AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT
* OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.

*

* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_surface.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_surface.h
No license file was found, but licenses were detected in source scan.

/*

* Copyright 1999, 2000 Precision Insight, Inc., Cedar Park, Texas.

```

* Copyright 2000 VA Linux Systems, Inc., Sunnyvale, California.
* All Rights Reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
* DEALINGS IN THE SOFTWARE.
*/

```

Found in path(s):

```

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86drm.h

```

No license file was found, but licenses were detected in source scan.

```

# Copyright 2005 Adam Jackson.
#
# Permission is hereby granted, free of charge, to any person obtaining a
# copy of this software and associated documentation files (the "Software"),
# to deal in the Software without restriction, including without limitation
# on the rights to use, copy, modify, merge, publish, distribute, sub
# license, and/or sell copies of the Software, and to permit persons to whom
# the Software is furnished to do so, subject to the following conditions:
#
# The above copyright notice and this permission notice (including the next
# paragraph) shall be included in all copies or substantial portions of the
# Software.
#
# THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
# IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
# FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
# ADAM JACKSON BE LIABLE FOR ANY CLAIM,
# DAMAGES OR OTHER LIABILITY, WHETHER
# IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN

```

```
# CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.
```

```
AC_PREREQ([2.63])
```

```
AC_INIT([libdrm],  
        [2.4.39],  
        [https://bugs.freedesktop.org/enter_bug.cgi?product=DRI],  
        [libdrm])
```

```
AC_CONFIG_HEADERS([config.h])  
AC_CONFIG_SRCDIR([Makefile.am])  
AC_CONFIG_MACRO_DIR([m4])  
AC_CONFIG_AUX_DIR([build-aux])
```

```
AM_INIT_AUTOMAKE([1.10 foreign dist-bzip2])  
AM_MAINTAINER_MODE([enable])
```

```
# Enable quiet compiles on automake 1.11.  
m4_ifdef([AM_SILENT_RULES], [AM_SILENT_RULES([yes])])
```

```
# Check for programs  
AC_PROG_CC
```

```
AC_USE_SYSTEM_EXTENSIONS  
AC_SYS_LARGEFILE  
AC_FUNC_ALLOCA
```

```
# Initialize libtool  
LT_PREREQ([2.2])  
LT_INIT([disable-static])
```

```
PKG_CHECK_MODULES(PTHREADSTUBS, pthread-stubs)  
AC_SUBST(PTHREADSTUBS_CFLAGS)  
AC_SUBST(PTHREADSTUBS_LIBS)
```

```
pkgconfigdir=${libdir}/pkgconfig  
AC_SUBST(pkgconfigdir)  
AC_ARG_ENABLE([udev],  
              [AS_HELP_STRING([--enable-udev],  
                              [Enable support for using udev instead of mknod (default: disabled)]),  
              [UDEV=$enableval], [UDEV=no])
```

```
AC_ARG_ENABLE([libkms],  
              [AS_HELP_STRING([--disable-libkms],  
                              [Disable KMS mm abstraction library (default: auto)]),  
              [LIBKMS=$enableval], [LIBKMS=auto])
```

```
AC_ARG_ENABLE([intel],
```

```

AS_HELP_STRING([--disable-intel],
[Enable support for intel's KMS API (default: auto)]),
[INTEL=$enableval], [INTEL=auto])

AC_ARG_ENABLE(radeon,
AS_HELP_STRING([--disable-radeon],
[Enable support for radeon's KMS API (default: auto)]),
[RADEON=$enableval], [RADEON=auto])

AC_ARG_ENABLE(nouveau,
AS_HELP_STRING([--disable-nouveau],
[Enable support for nouveau's KMS API (default: auto)]),
[NOUVEAU=$enableval], [NOUVEAU=auto])

AC_ARG_ENABLE(vmwgfx-experimental-api,
AS_HELP_STRING([--enable-vmwgfx-experimental-api],
[Install vmwgfx's experimental kernel API header (default:
disabled)]),
[VMWGFX=$enableval], [VMWGFX=no])

AC_ARG_ENABLE(omap-experimental-api,
AS_HELP_STRING([--enable-omap-experimental-api],
[Enable support for OMAP's experimental API (default: disabled)]),
[OMAP=$enableval], [OMAP=no])

AC_ARG_ENABLE(exynos-experimental-api,
AS_HELP_STRING([--enable-exynos-experimental-api],
[Enable support for EXYNOS's experimental API (default: disabled)]),
[EXYNOS=$enableval], [EXYNOS=no])

dnl =====
dnl check compiler flags
AC_DEFUN([LIBDRM_CC_TRY_FLAG], [
AC_MSG_CHECKING([whether $CC supports $1])

libdrm_save_CFLAGS="$CFLAGS"
CFLAGS="$CFLAGS $1"

AC_COMPILE_IFELSE([ ], [libdrm_cc_flag=yes], [libdrm_cc_flag=no])
CFLAGS="$libdrm_save_CFLAGS"

if test "x$libdrm_cc_flag" = "xyes"; then
  ifelse([$2], , :, [$2])
else
  ifelse([$3], , :, [$3])
fi
AC_MSG_RESULT([$libdrm_cc_flag])
])

```

dnl We use clock_gettime to check
for timeouts in drmWaitVBlank

```
AC_CHECK_FUNCS([clock_gettime], [CLOCK_LIB=],  
    [AC_CHECK_LIB([rt], [clock_gettime], [CLOCK_LIB=-lrt],  
        [AC_MSG_ERROR([Couldn't find clock_gettime])])])  
AC_SUBST([CLOCK_LIB])
```

```
AC_CHECK_FUNCS([open_memstream], [HAVE_OPEN_MEMSTREAM=yes])
```

dnl Use lots of warning flags with with gcc and compatible compilers

dnl Note: if you change the following variable, the cache is automatically
dnl skipped and all flags rechecked. So there's no need to do anything
dnl else. If for any reason you need to force a recheck, just change
dnl MAYBE_WARN in an ignorable way (like adding whitespace)

```
MAYBE_WARN="-Wall -Wextra \  
-Wsign-compare -Werror-implicit-function-declaration \  
-Wpointer-arith -Wwrite-strings -Wstrict-prototypes \  
-Wmissing-prototypes -Wmissing-declarations -Wnested-externs \  
-Wpacked -Wswitch-enum -Wmissing-format-attribute \  
-Wstrict-aliasing=2 -Winit-self \  
-Wdeclaration-after-statement -Wold-style-definition \  
-Wno-missing-field-initializers  
-Wno-unused-parameter \  
-Wno-attributes -Wno-long-long -Winline"
```

```
# invalidate cached value if MAYBE_WARN has changed  
if test "x$libdrm_cv_warn_maybe" != "x$MAYBE_WARN"; then  
    unset libdrm_cv_warn_cflags  
fi  
AC_CACHE_CHECK([for supported warning flags], libdrm_cv_warn_cflags, [  
    echo  
    WARN_CFLAGS=""
```

```
# Some warning options are not supported by all versions of  
# gcc, so test all desired options against the current  
# compiler.  
#  
# Note that there are some order dependencies  
# here. Specifically, an option that disables a warning will  
# have no net effect if a later option then enables that  
# warnings, (perhaps implicitly). So we put some grouped  
# options (-Wall and -Wextra) up front and the -Wno options  
# last.
```

```

for W in $MAYBE_WARN; do
  LIBDRM_CC_TRY_FLAG([$W], [WARN_CFLAGS="$WARN_CFLAGS $W"])
done

libdrm_cv_warn_cflags=$WARN_CFLAGS
libdrm_cv_warn_maybe=$MAYBE_WARN

AC_MSG_CHECKING([which warning flags were supported])
WARN_CFLAGS="$libdrm_cv_warn_cflags"

if
  test "x$UDEV" = xyes; then
  AC_DEFINE(UDEV, 1, [Have UDEV support])
fi

AC_CANONICAL_HOST
if test "x$LIBKMS" = xauto ; then
  case $host_os in
    linux*) LIBKMS="yes" ;;
    *) LIBKMS="no" ;;
  esac
fi

AM_CONDITIONAL(HAVE_LIBKMS, [test "x$LIBKMS" = xyes])

AM_CONDITIONAL(HAVE_VMWGFX, [test "x$VMWGFX" = xyes])
if test "x$VMWGFX" = xyes; then
  AC_DEFINE(HAVE_VMWGFX, 1, [Have vmwgfx kernel headers])
fi

AM_CONDITIONAL(HAVE_NOUVEAU, [test "x$NOUVEAU" = xyes])
if test "x$NOUVEAU" = xyes; then
  AC_DEFINE(HAVE_NOUVEAU, 1, [Have nouveau (nvidia) support])
fi

AM_CONDITIONAL(HAVE_OMAP, [test "x$OMAP" = xyes])
if test "x$OMAP" = xyes; then
  AC_DEFINE(HAVE_OMAP, 1, [Have OMAP support])
fi

AM_CONDITIONAL(HAVE_EXYNOS, [test "x$EXYNOS" = xyes])
if test "x$EXYNOS" = xyes; then
  AC_DEFINE(HAVE_EXYNOS, 1, [Have EXYNOS support])
fi

PKG_CHECK_MODULES(CAIRO, cairo, [HAVE_CAIRO=yes], [HAVE_CAIRO=no])
if test "x$HAVE_CAIRO" = xyes; then
  AC_DEFINE(HAVE_CAIRO, 1, [Have cairo support])

```



```

fi
AM_CONDITIONAL(HAVE_CAIRO,
[test "x$HAVE_CAIRO" = xyes])

# For enumerating devices in test case
PKG_CHECK_MODULES(LIBUDEV, libudev, [HAVE_LIBUDEV=yes], [HAVE_LIBUDEV=no])
if test "x$HAVE_LIBUDEV" = xyes; then
    AC_DEFINE(HAVE_LIBUDEV, 1, [Have libudev support])
fi
AM_CONDITIONAL(HAVE_LIBUDEV, [test "x$HAVE_LIBUDEV" = xyes])

if test "x$INTEL" != "xno" -o "x$RADEON" != "xno" -o "x$NOUVEAU" != "xno" -o "x$OMAP" != "xno"; then
    # Check for atomic intrinsics
    AC_CACHE_CHECK([for native atomic primitives], drm_cv_atomic_primitives,
    [
        drm_cv_atomic_primitives="none"

        AC_LINK_IFELSE([AC_LANG_PROGRAM([[
int atomic_add(int i) { return __sync_fetch_and_add (&i, 1); }
int atomic_cmpxchg(int i, int j, int k) { return __sync_val_compare_and_swap (&i, j, k); }
]], [[]]),
            [drm_cv_atomic_primitives="Intel"],[])

        if test "x$drm_cv_atomic_primitives" = "xnone"; then
            AC_CHECK_HEADER([atomic_ops.h],
drm_cv_atomic_primitives="libatomic-ops")
        fi

        # atomic functions defined in <atomic.h> & libc on Solaris
        if test "x$drm_cv_atomic_primitives" = "xnone"; then
            AC_CHECK_FUNC([atomic_cas_uint],
drm_cv_atomic_primitives="Solaris")
        fi

    ])

    if test "x$drm_cv_atomic_primitives" = xIntel; then
        AC_DEFINE(HAVE_LIBDRM_ATOMIC_PRIMITIVES, 1,
            [Enable if your compiler supports the Intel __sync_* atomic primitives])
    fi

    if test "x$drm_cv_atomic_primitives" = "xlibatomic-ops"; then
        AC_DEFINE(HAVE_LIB_ATOMIC_OPS, 1, [Enable if you have libatomic-ops-dev installed])
    fi

    if test "x$drm_cv_atomic_primitives" = "xnone"; then
        if test "x$INTEL" != "xauto"; then
            if test "x$INTEL" != "xno"; then
                AC_MSG_ERROR([libdrm_intel depends upon atomic operations, which were not found for your
compiler/cpu. Try compiling with -march=native, or install the libatomics-op-dev package, or, failing

```

```

both of those, disable support for Intel GPUs by passing --disable-intel to ./configure))
    fi
else
    AC_MSG_WARN([Disabling libdrm_intel. It depends on atomic operations, which were not found for
your compiler/cpu. Try compiling with -march=native, or install the libatomic-ops-dev package.])
    INTEL=no
fi
if test "x$RADEON" != "xauto"; then
    if test "x$RADEON" != "xno"; then
        AC_MSG_ERROR([libdrm_radeon depends upon atomic operations, which were not found for your
compiler/cpu. Try compiling with -march=native, or install the libatomic-ops-dev package, or, failing both of those,
disable support for Radeon support by passing --disable-radeon to ./configure])
    fi
else
    AC_MSG_WARN([Disabling libdrm_radeon. It depends on atomic operations, which were not found for
your compiler/cpu. Try compiling with -march=native,
or install the libatomic-ops-dev package.])
    RADEON=no
fi
if test "x$NOUVEAU" != "xauto"; then
    if test "x$NOUVEAU" != "xno"; then
        AC_MSG_ERROR([libdrm_nouveau depends upon atomic operations, which were not found for your
compiler/cpu. Try compiling with -march=native, or install the libatomic-ops-dev package, or, failing both of those,
disable support for NVIDIA GPUs by passing --disable-nouveau to ./configure])
    fi
else
    AC_MSG_WARN([Disabling libdrm_nouveau. It depends on atomic operations, which were not found
for your compiler/cpu. Try compiling with -march=native, or install the libatomic-ops-dev package.])
    NOUVEAU=no
fi
else
    if test "x$INTEL" != "xno"; then
        case $host_cpu in
            i?86|x86_64) INTEL=yes ;;
            *) INTEL=no ;;
        esac
    fi
    if test "x$RADEON" != "xno"; then
        RADEON=yes
    fi
    if test "x$NOUVEAU" != "xno"; then
        NOUVEAU=yes
    fi
fi
fi

if test "x$INTEL" != "xno"; then

```

```

PKG_CHECK_MODULES(PCIAACCESS, [pciaccess >= 0.10])
fi
AC_SUBST(PCIAACCESS_CFLAGS)
AC_SUBST(PCIAACCESS_LIBS)

PKG_CHECK_MODULES(VAALGRIND, [valgrind], [have_valgrind=yes], [have_valgrind=no])
if test "x$have_valgrind" = "xyes"; then
    AC_DEFINE([HAVE_VALGRIND], 1, [Use valgrind intrinsics to suppress false warnings])
fi

AM_CONDITIONAL(HAVE_INTEL, [test "x$INTEL" != "xno"])
AM_CONDITIONAL(HAVE_RADEON, [test "x$RADEON" != "xno"])
AM_CONDITIONAL(HAVE_NOUVEAU, [test "x$NOUVEAU" != "xno"])
if test "x$RADEON" = "xyes"; then
    AC_DEFINE(HAVE_RADEON, 1, [Have radeon support])
fi

AC_ARG_WITH([kernel-source],
    [AS_HELP_STRING([--with-kernel-source],
        [specify path to linux kernel source])],
    [kernel_source="$with_kernel_source"])
AC_SUBST(kernel_source)

AC_SUBST(WARN_CFLAGS)
AC_CONFIG_FILES([
    Makefile
    libkms/Makefile
    libkms/libkms.pc
    intel/Makefile
    intel/libdrm_intel.pc
    radeon/Makefile
    radeon/libdrm_radeon.pc
    nouveau/Makefile
    nouveau/libdrm_nouveau.pc
    omap/Makefile
    omap/libdrm_omap.pc
    exynos/Makefile
    exynos/libdrm_exynos.pc
    tests/Makefile
    tests/modeprint/Makefile
    tests/modetest/Makefile
    tests/kmstest/Makefile
    tests/radeon/Makefile
    tests/vbltest/Makefile
    include/Makefile
    include/drm/Makefile
    libdrm.pc])
AC_OUTPUT

```

```
echo
"""
echo "$PACKAGE_STRING will be compiled with:"
echo ""
echo " libkms      $LIBKMS"
echo " Intel API   $INTEL"
echo " vmwgfx API  $VMWGFX"
echo " Radeon API  $RADEON"
echo " Nouveau API $NOUVEAU"
echo " OMAP API    $OMAP"
echo " EXYNOS API  $EXYNOS"
echo ""
```

Found in path(s):

```
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/configure.ac
```

No license file was found, but licenses were detected in source scan.

```
/*
```

```
* Copyright © 2011 Red Hat
```

```
*
```

```
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
```

```
*
```

```
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
```

```
*
```

```
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE
* FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.
```

```
*
```

```
* Authors:
```

```
* Jerome Glisse <j.glisse@gmail.com>
```

```
*/
```

Found in path(s):

```
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
```

gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/radeon/rbo.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/radeon/radeon_ttm.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/radeon/rbo.h
No license file was found, but licenses were detected in source scan.

/*
* Copyright 2010 Jerome Glisse <glisse@freedesktop.org>
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* on the rights to use, copy, modify, merge, publish, distribute, sub
* license, and/or sell copies of the Software, and to permit persons to whom
* the Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
* THE AUTHOR(S)
AND/OR THEIR SUPPLIERS BE LIABLE FOR ANY CLAIM,
* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR
* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.
*
* Authors:
* Jerome Glisse
*/

Found in path(s):
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/bof.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/bof.c
No license file was found, but licenses were detected in source scan.

/*
* Copyright 2006 Tungsten Graphics, Inc., Bismarck, ND. USA.
* All Rights Reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the

* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
* THE COPYRIGHT HOLDERS, AUTHORS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM,
* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR
* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.
*
* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libdrm_lists.h

No license file was found, but licenses were detected in source scan.

/* xf86drmSL.c -- Skip list support

* Created: Mon May 10 09:28:13 1999 by faith@precisioninsight.com

*

* Copyright 1999 Precision Insight, Inc., Cedar Park, Texas.

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED
* TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER

```

* DEALINGS IN THE SOFTWARE.
*
* Authors: Rickard E. (Rik) Faith <faith@valinux.com>
*
* DESCRIPTION
*
* This file contains a straightforward skip list implementation.n
*
* FUTURE ENHANCEMENTS
*
* REFERENCES
*
* [Pugh90] William Pugh. Skip Lists: A Probabilistic Alternative to
* Balanced Trees. CACM 33(6), June 1990, pp. 668-676.
*
*/

```

Found in path(s):

```

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86drmSL.c
No license file was found, but licenses were detected in source scan.

```

```

/* mga_drm.h -- Public header for the Matrox g200/g400 driver -*- linux-c -*-

```

```

* Created: Tue Jan 25 01:50:01 1999 by jhartmann@precisioninsight.com

```

```

* Copyright 1999 Precision Insight, Inc., Cedar Park, Texas.

```

```

* Copyright 2000 VA Linux Systems, Inc., Sunnyvale, California.

```

```

* All rights reserved.

```

```

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

```

```

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

```

```

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* VA LINUX SYSTEMS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
* OTHER DEALINGS IN THE SOFTWARE.

```

* Authors:
* Jeff Hartmann <jhartmann@valinux.com>
* Keith Whitwell <keith@tungstengraphics.com>
*
* Rewritten by:
* Gareth Hughes <gareth@valinux.com>
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/mga_drm.h
No license file was found, but licenses were detected in source scan.

/*

* Copyright 1998-2003 VIA Technologies, Inc. All Rights Reserved.
* Copyright 2001-2003 S3 Graphics, Inc. All Rights Reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sub license,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A
* PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
* VIA, S3 GRAPHICS, AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
* DEALINGS IN THE SOFTWARE.
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/via_drm.h
No license file was found, but licenses were detected in source scan.

/* drmstat.c -- DRM device status and testing program

* Created: Tue Jan 5 08:19:24 1999 by faith@precisioninsight.com
*
* Copyright 1999 Precision Insight, Inc., Cedar Park, Texas.
* Copyright 2000 VA Linux Systems, Inc., Sunnyvale, California.

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED

"AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
* DEALINGS IN THE SOFTWARE.

*

* Authors: Rickard E. (Rik) Faith <faith@valinux.com>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/drmstat.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright 2000 Precision Insight, Inc., Cedar Park, Texas.

* Copyright 2000 VA Linux Systems, Inc., Sunnyvale, California.

* All rights reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
* DEALINGS IN THE SOFTWARE.

*

* Authors:

* Gareth Hughes <gareth@valinux.com>
* Kevin E. Martin <martin@valinux.com>

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/r128_drm.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2011 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS
* BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*

* Authors:

* Ben Widawsky <ben@bwidawsk.net>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_debug.h

No license file was found, but licenses were detected in source scan.

```
# This Makefile.in is free software; the Free Software Foundation
# gives unlimited permission to copy and/or distribute it,
# with or without modifications, as long as this notice is preserved.
# This program is distributed in the hope that it will be useful,
# Permission is hereby granted, free of charge, to any person obtaining a
# copy of this software and associated documentation files (the "Software"),
# to deal in the Software without restriction, including without limitation
# on the rights to use, copy, modify, merge, publish, distribute, sub
# license, and/or sell copies of the Software, and to permit persons to whom
# the Software is furnished to do so, subject to the following conditions:
# The above copyright notice and this permission notice (including the next
```

Found in path(s):

```
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/Makefile
```

No license file was found, but licenses were detected in source scan.

```
/*
```

```
* Copyright © 2009-2011 Intel Corporation
```

```
*
```

```
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
```

```
*
```

```
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
```

```
*
```

```
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT
HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.
```

```
*/
```

Found in path(s):

```
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_decode.c
```

No license file was found, but licenses were detected in source scan.

/*

* Copyright 2002 Tungsten Graphics, Inc., Cedar Park, Texas.

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN
* NO EVENT SHALL

* TUNGSTEN GRAPHICS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
* OTHER DEALINGS IN THE SOFTWARE.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/drm_sarea.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2008 Jérôme Glisse

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining
* a copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
* EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES
* OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND
* NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS, AUTHORS
* AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,

* ARISING
FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.
*
* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_bo.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_cs_gem.c
No license file was found, but licenses were detected in source scan.

```
/* xf86drmRandom.c -- "Minimal Standard" PRNG Implementation
 * Created: Mon Apr 19 08:28:13 1999 by faith@precisioninsight.com
 *
 * Copyright 1999 Precision Insight, Inc., Cedar Park, Texas.
 * All Rights Reserved.
 *
 * Permission is hereby granted, free of charge, to any person obtaining a
 * copy of this software and associated documentation files (the "Software"),
 * to deal in the Software without restriction, including without limitation
 * the rights to use, copy, modify, merge, publish, distribute, sublicense,
 * and/or sell copies of the Software, and to permit persons to whom the
 * Software is furnished to do so, subject to the following conditions:
 *
 * The above copyright notice and this permission notice (including the next
 * paragraph) shall be included in all copies or substantial portions of the
 * Software.
 *
 * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
 * IMPLIED,
 * INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
 * FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
 * PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
 * OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
 * ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
 * DEALINGS IN THE SOFTWARE.
 *
 * Authors: Rickard E. (Rik) Faith <faith@valinux.com>
 *
 * DESCRIPTION
 *
 * This file contains a simple, straightforward implementation of the Park
 * & Miller "Minimal Standard" PRNG [PM88, PMS93], which is a Lehmer
```

* multiplicative linear congruential generator (MLCG) with a period of
* $2^{31}-1$.

*

* This implementation is intended to provide a reliable, portable PRNG
* that is suitable for testing a hash table implementation and for
* implementing skip lists.

*

* FUTURE ENHANCEMENTS

*

* If initial seeds are not selected randomly, two instances of the PRNG
* can be correlated.

[Knuth81, pp. 32-33] describes a shuffling technique

* that can eliminate this problem.

*

* If PRNGs are used for simulation, the period of the current
* implementation may be too short. [LE88] discusses methods of combining
* MLCGs to produce much longer periods, and suggests some alternative
* values for A and M. [LE90 and Sch92] also provide information on
* long-period PRNGs.

*

* REFERENCES

*

* [Knuth81] Donald E. Knuth. The Art of Computer Programming. Volume 2:
* Seminumerical Algorithms. Reading, Massachusetts: Addison-Wesley, 1981.

*

* [LE88] Pierre L'Ecuyer. "Efficient and Portable Combined Random Number
* Generators". CACM 31(6), June 1988, pp. 742-774.

*

* [LE90] Pierre L'Ecuyer. "Random Numbers for Simulation". CACM 33(10),
* October 1990, pp. 85-97.

*

* [PM88] Stephen K. Park and Keith W. Miller. "Random Number Generators:
* Good Ones are Hard to Find". CACM 31(10), October 1988, pp. 1192-1201.

*

* [Sch92] Bruce Schneier. "Pseudo-Ransom Sequence
* Generator for 32-Bit

* CPUs". Dr. Dobbs's Journal 17(2), February 1992, pp. 34, 37-38, 40.

*

* [PMS93] Stephen K. Park, Keith W. Miller, and Paul K. Stockmeyer. In

* "Technical Correspondence: Remarks on Choosing and Implementing Random
* Number Generators". CACM 36(7), July 1993, pp. 105-110.

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
* gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86drmRandom.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2009 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS
* BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*

* Authors:

* Kristian Høgsberg <krh@bitplanet.net>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/name_from_fd.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright (C) 2011 Texas Instruments, Inc

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT
* HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM,
* OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
* SOFTWARE.
*
* Authors:
* Rob Clark <rob@ti.com>
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/omap/omap_drmif.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/omap/omap_drm.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/omap/omap_drm.h
No license file was found, but licenses were detected in source scan.

/*
* Copyright © 2008-2012 Intel Corporation
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT
* HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.
*
* Authors:
* Eric Anholt <eric@anholt.net>

*
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_bufmgr.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright 2005 Eric Anholt

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR
COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM,
* OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
* SOFTWARE.

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/sis_drm.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2008 Nicolai Haehnle

* Copyright © 2008 Jérôme Glisse

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining
* a copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,

- * distribute, sub license, and/or sell copies of the Software, and to
- * permit persons to whom the Software is furnished to do so, subject to
- * the following conditions:
- *
- * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
- * EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES
- * OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND
- * NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS, AUTHORS
- * AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
- * LIABILITY, WHETHER IN AN ACTION OF CONTRACT,
- TORT OR OTHERWISE,
- * ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
- * USE OR OTHER DEALINGS IN THE SOFTWARE.
- *
- * The above copyright notice and this permission notice (including the
- * next paragraph) shall be included in all copies or substantial portions
- * of the Software.
- */

Found in path(s):

- * /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_cs_gem.h

No license file was found, but licenses were detected in source scan.

/* exynos_drm.h

- *
- * Copyright (c) 2011 Samsung Electronics Co., Ltd.
- * Authors:
- * Inki Dae <inki.dae@samsung.com>
- * Joonyoung Shim <jy0922.shim@samsung.com>
- * Seung-Woo Kim <sw0312.kim@samsung.com>
- *
- * Permission is hereby granted, free of charge, to any person obtaining a
- * copy of this software and associated documentation files (the "Software"),
- * to deal in the Software without restriction, including without limitation
- * the rights to use, copy, modify, merge, publish, distribute, sublicense,
- * and/or sell copies of the Software, and to permit persons to whom the
- * Software is furnished to do so, subject to the following conditions:
- *
- * The above copyright notice and this permission notice (including the next
- * paragraph) shall be included in all copies or substantial portions of the
- * Software.
- *
- * THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
- * IMPLIED, INCLUDING
- BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
- * FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
- * VA LINUX SYSTEMS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR

* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
* OTHER DEALINGS IN THE SOFTWARE.
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/exynos/exynos_drm.h
No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2008 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS
BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*

* Authors:

* Eric Anholt <eric@anholt.net>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/gem_flink.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/gem_basic.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/gem_mmap.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_bufmgr_priv.h
*

/opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/gem_readwrite.c

No license file was found, but licenses were detected in source scan.

/* savage_drm.h -- Public header for the savage driver

*

* Copyright 2004 Felix Kuehling

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sub license,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
* EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF
* MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE

AND

* NON-INFRINGEMENT. IN NO EVENT SHALL FELIX KUEHLING BE LIABLE FOR
* ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF
* CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION
* WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/savage_drm.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2011 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS
* BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/test_decode.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2010 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS
* BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*

* Authors:

* Eric Anholt <eric@anholt.net>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/intel_aub.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright 1999 Precision Insight, Inc., Cedar Park, Texas.

* Copyright 2000 VA Linux Systems, Inc., Sunnyvale, California.

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
* DEALINGS IN THE SOFTWARE.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86drm.c

No license file was found, but licenses were detected in source scan.

/*

* GLX Hardware Device Driver common code

* Copyright (C) 1999 Wittawat Yamwong

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice shall be included
* in all copies or substantial portions of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
* OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,

* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* WITTAWAT YAMWONG, OR
ANY OTHER CONTRIBUTORS BE LIABLE FOR ANY CLAIM,
* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR
* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE
* OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.
*
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/intel/mm.c
No license file was found, but licenses were detected in source scan.

/*

* Copyright (C) 2012 Samsung Electronics Co., Ltd.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR
COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM,
* OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE
* SOFTWARE.

*

* Authors:

* Inki Dae <inki.dae@samsung.com>

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/exynos/exynos_drmif.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/exynos/exynos_drm.c
No license file was found, but licenses were detected in source scan.

```
/*
* Copyright 2005 Stephane Marchesin.
* All Rights Reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* VA LINUX
SYSTEMS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR
* OTHER DEALINGS IN THE SOFTWARE.
*/
```

Found in path(s):

```
*/opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/nouveau_drm.h
No license file was found, but licenses were detected in source scan.
```

```
/* dristat.c --
* Created: Mon Jan 15 05:05:07 2001 by faith@acm.org
*
* Copyright 2000 VA Linux Systems, Inc., Fremont, California.
* All Rights Reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:
*
* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
```


* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
* DEALINGS IN THE SOFTWARE.

*

* Authors: Rickard E. (Rik) Faith <faith@valinux.com>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/dristat.c

No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 2007 Dave Airlie <airlied@linux.ie>

* Copyright (c) 2007 Jakob Bornecrantz <wallbraker@gmail.com>

* Copyright (c) 2008 Red Hat Inc.

* Copyright (c) 2007-2008 Tungsten Graphics, Inc., Cedar Park, TX., USA

* Copyright (c) 2007-2008 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice shall be included in
* all copies or substantial portions of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,
* EXPRESS OR

* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE
* AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/drm_mode.h

No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2009 Intel Corporation

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* THE AUTHORS OR COPYRIGHT HOLDERS
* BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER
* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING
* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS
* IN THE SOFTWARE.

*

* Authors:

* Chris Wilson <chris@chris-wilson.co.uk>

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-
* gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86atomic.h

No license file was found, but licenses were detected in source scan.

/******

*

* Copyright © 2009 VMware, Inc., Palo Alto, CA., USA

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to
* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:

*

* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions

* of the Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR
* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL
* THE COPYRIGHT HOLDERS, AUTHORS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM,
* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR
* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE
* USE OR OTHER DEALINGS IN THE SOFTWARE.
*
*****/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/radeon.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/nouveau.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/libkms.h
*
/opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/internal.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/dumb.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/vmwgfx_drm.h
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/kmstest/main.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/api.c
*
/opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/vmwgfx.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/linux.c
* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/libkms/intel.c
No license file was found, but licenses were detected in source scan.

/*
* Copyright 2003 Tungsten Graphics, Inc., Cedar Park, Texas.
* All Rights Reserved.
*
* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the
* "Software"), to deal in the Software without restriction, including
* without limitation the rights to use, copy, modify, merge, publish,
* distribute, sub license, and/or sell copies of the Software, and to

* permit persons to whom the Software is furnished to do so, subject to
* the following conditions:
*
* The above copyright notice and this permission notice (including the
* next paragraph) shall be included in all copies or substantial portions
* of the Software.
*
* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
* OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF
* MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT.
* IN NO EVENT SHALL TUNGSTEN GRAPHICS AND/OR ITS SUPPLIERS BE LIABLE FOR
* ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT,
* TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE
* SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.
*
*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/include/drm/i915_drm.h
No license file was found, but licenses were detected in source scan.

/*

* Copyright © 2008 Nicolai Haehnle

* Copyright © 2008 Jérôme Glisse

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a

* copy of this software and associated documentation files (the

* "Software"), to deal in the Software without restriction, including

* without limitation the rights to use, copy, modify, merge, publish,

* distribute, sub license, and/or sell copies of the Software, and to

* permit persons to whom the Software is furnished to do so, subject to

* the following conditions:

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,

* FITNESS FOR A PARTICULAR PURPOSE AND NON-INFRINGEMENT. IN NO EVENT SHALL

* THE COPYRIGHT HOLDERS, AUTHORS AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM,

* DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT,

TORT OR

* OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE

* USE OR OTHER DEALINGS IN THE SOFTWARE.

*

* The above copyright notice and this permission notice (including the

* next paragraph) shall be included in all copies or substantial portions

* of the Software.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/radeon/radeon_cs.h
No license file was found, but licenses were detected in source scan.

/*

* DRM based mode setting test program

* Copyright 2008 Tungsten Graphics

* Jakob Bornecrantz <jakob@tungstengraphics.com>

* Copyright 2008 Intel Corporation

* Jesse Barnes <jesse.barnes@intel.com>

*

* Permission is hereby granted, free of charge, to any person obtaining a

* copy of this software and associated documentation files (the "Software"),

* to deal in the Software without restriction, including without limitation

* the rights to use, copy, modify, merge, publish, distribute, sublicense,

* and/or sell copies of the Software, and to permit persons to whom the

* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice shall be included in

* all copies or substantial portions of the Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES

OF MERCHANTABILITY,

* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE

* AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER

* LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING

* FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS

* IN THE SOFTWARE.

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/vbltest/vbltest.c

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/modetest/buffers.c

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/modetest/buffers.h

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/tests/modetest/modetest.c

No license file was found, but licenses were detected in source scan.

/* xf86drmHash.c -- Small hash table support for integer -> integer mapping

* Created: Sun Apr 18 09:35:45 1999 by faith@precisioninsight.com

*

* Copyright 1999 Precision Insight, Inc., Cedar Park, Texas.

* All Rights Reserved.

*

* Permission is hereby granted, free of charge, to any person obtaining a
* copy of this software and associated documentation files (the "Software"),
* to deal in the Software without restriction, including without limitation
* the rights to use, copy, modify, merge, publish, distribute, sublicense,
* and/or sell copies of the Software, and to permit persons to whom the
* Software is furnished to do so, subject to the following conditions:

*

* The above copyright notice and this permission notice (including the next
* paragraph) shall be included in all copies or substantial portions of the
* Software.

*

* THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS
OR

* IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,
* FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL
* PRECISION INSIGHT AND/OR ITS SUPPLIERS BE LIABLE FOR ANY CLAIM, DAMAGES OR
* OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE,
* ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER
* DEALINGS IN THE SOFTWARE.

*

* Authors: Rickard E. (Rik) Faith <faith@valinux.com>

*

* DESCRIPTION

*

* This file contains a straightforward implementation of a fixed-sized
* hash table using self-organizing linked lists [Knuth73, pp. 398-399] for
* collision resolution. There are two potentially interesting things
* about this implementation:

*

* 1) The table is power-of-two sized. Prime sized tables are more
* traditional, but do not have a significant advantage over power-of-two
* sized table, especially when double hashing is not used for collision
* resolution.

*

* 2) The hash computation
uses a table of random integers [Hanson97,
* pp. 39-41].

*

* FUTURE ENHANCEMENTS

*

* With a table size of 512, the current implementation is sufficient for a
* few hundred keys. Since this is well above the expected size of the
* tables for which this implementation was designed, the implementation of
* dynamic hash tables was postponed until the need arises. A common (and
* naive) approach to dynamic hash table implementation simply creates a
* new hash table when necessary, rehashes all the data into the new table,

* and destroys the old table. The approach in [Larson88] is superior in
* two ways: 1) only a portion of the table is expanded when needed,
* distributing the expansion cost over several insertions, and 2) portions
* of the table can be locked, enabling a scalable thread-safe
* implementation.

*

* REFERENCES

*

* [Hanson97] David R. Hanson. C Interfaces and Implementations:
* Techniques for Creating Reusable Software. Reading, Massachusetts:
* Addison-Wesley, 1997.

*

* [Knuth73] Donald E. Knuth. The Art of Computer Programming. Volume 3:
* Sorting and Searching. Reading, Massachusetts: Addison-Wesley, 1973.

*

* [Larson88] Per-Ake Larson. "Dynamic Hash Tables". CACM 31(4), April
* 1988, pp. 446-457.

*

*/

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm-2.4.39.tar.bz2-cosi-expand-archive-kvcujjM7/libdrm-2.4.39/xf86drmHash.c

No license file was found, but licenses were detected in source scan.

License: MIT

Found in path(s):

* /opt/cola/permits/2005422175_1715245585.4411945/0/libdrm-2.4.39-1.el6-1.src.rpm-cosi-expand-archive-gqAY2IYk/libdrm.spec

1.187 initscripts 9.03.38-1.el6.centos.2

1.187.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free

software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such

interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is

allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version  
2 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program; if not, write to the Free Software  
Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA
```

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.188 berkeley-db 4.7.25

1.188.1 Available under license :

```
/*_  
* $Id: LICENSE,v 12.9 2008/02/07 17:12:17 mark Exp $  
*/
```

The following is the license that applies to this copy of the Berkeley DB software. For a license to use the Berkeley DB software under conditions other than those described here, or to purchase support for this software, please contact Oracle at berkeleydb-info_us@oracle.com.

```
-----
```

```
/*  
* Copyright (c) 1990,2008 Oracle. All rights reserved.  
*  
* Redistribution and use in source and binary forms, with or without  
* modification, are permitted provided that the following conditions  
* are met:  
* 1. Redistributions of source code must retain the above copyright  
* notice, this list of conditions and the following disclaimer.  
* 2. Redistributions in binary form must reproduce the above copyright  
* notice, this list of conditions and the following disclaimer in the  
* documentation and/or other materials provided with the distribution.  
* 3. Redistributions in any form must  
be accompanied by information on  
* how to obtain complete source code for the DB software and any  
* accompanying software that uses the DB software. The source code  
* must either be included in the distribution or be available for no  
* more than the cost of distribution plus a nominal fee, and must be  
* freely redistributable under reasonable conditions. For an  
* executable file, complete source code means the source code for all  
* modules it contains. It does not include source code for modules or  
* files that typically accompany the major components of the operating  
* system on which the executable file runs.  
*  
* THIS SOFTWARE IS PROVIDED BY ORACLE ``AS IS" AND ANY EXPRESS OR  
* IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED
```

* WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, OR
* NON-INFRINGEMENT, ARE DISCLAIMED. IN NO EVENT SHALL ORACLE BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY,
OR
* CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF
* SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR
* BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
* WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE
* OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN
* IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

*/

/*

* Copyright (c) 1990, 1993, 1994, 1995

* The Regents of the University of California. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:

* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other

materials provided with the distribution.

* 3. Neither the name of the University nor the names of its contributors
* may be used to endorse or promote products derived from this software
* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY
OF
* SUCH DAMAGE.

*/

/*

* Copyright (c) 1995, 1996

* The President and Fellows of Harvard University. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:


```

* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
* 3. Neither the name of the University nor the names of its contributors
* may be used to endorse or promote products derived from this software
* without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY HARVARD AND ITS CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED
WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL HARVARD OR ITS CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*/
=====
/****
* ASM: a very small and fast Java bytecode manipulation framework
* Copyright (c) 2000-2005 INRIA, France Telecom
* All rights reserved.
*
* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:
* 1. Redistributions of source
code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
* 3. Neither the name of the copyright holders nor the names of its
* contributors may be used to endorse or promote products derived from
* this software without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS"
* AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE
* LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR
* CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF
* SUBSTITUTE

```

GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS
* INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN
* CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
* ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF
* THE POSSIBILITY OF SUCH DAMAGE.
*/

1.189 pyyaml 3.10-3.el6

1.189.1 Available under license :

Copyright (c) 2006 Kirill Simonov

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.190 cpio 2.10-11.el6_3

1.190.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we

stand ready to extend this provision to those domains
in future versions
of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate

Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding

Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content,

constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users'

Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and

its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the

Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information

does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or

- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not

impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that

country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed

under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License

along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>
This program comes with
ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.191 binutils 2.20.51.0.2-5.36.el6

1.191.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This

General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an

announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you

received the program in object code
or executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy
the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program

specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands
`show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
```


Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

The newlib subdirectory is a collection of software from several sources.

Each file may have its own copyright/license that is embedded in the source file. Unless otherwise noted in the body of the source file(s), the following copyright notices will apply to the contents of the newlib subdirectory:

(1) Red Hat Incorporated

Copyright (c) 1994-2007 Red Hat, Inc. All rights reserved.

This copyrighted material is made available to anyone wishing to use, modify, copy, or redistribute it subject to the terms and conditions of the BSD License. This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY expressed or implied, including the implied warranties of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. A copy of this license is available at <http://www.opensource.org/licenses>. Any Red Hat trademarks that are incorporated in the source code or documentation are not subject to the BSD License and may only be used or replicated with the express permission of Red Hat, Inc.

(2) University of California, Berkeley

Copyright (c) 1981-2000 The Regents of the University of California. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT

LIMITED TO, THE IMPLIED
WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE
DISCLAIMED.

IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT,
INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT

NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR
PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE
POSSIBILITY
OF SUCH DAMAGE.

(3) David M. Gay (AT&T 1991, Lucent 1998)

The author of this software is David M. Gay.

Copyright (c) 1991 by AT&T.

Permission to use, copy, modify, and distribute this software for any
purpose without fee is hereby granted, provided that this entire notice
is included in all copies of any software which is or includes a copy
or modification of this software and in
all copies of the supporting
documentation for such software.

THIS SOFTWARE IS BEING PROVIDED "AS IS", WITHOUT ANY EXPRESS OR IMPLIED
WARRANTY. IN PARTICULAR, NEITHER THE AUTHOR NOR AT&T MAKES ANY
REPRESENTATION OR WARRANTY OF ANY KIND CONCERNING THE MERCHANTABILITY
OF THIS SOFTWARE OR ITS FITNESS FOR ANY PARTICULAR PURPOSE.

The author of this software is David M. Gay.

Copyright (C) 1998-2001 by Lucent Technologies
All Rights Reserved

Permission to use, copy, modify, and distribute this software and
its documentation for any purpose and without fee is hereby
granted, provided that the above copyright notice appear in all
copies and that both that the copyright notice and this
permission notice and warranty disclaimer appear in supporting
documentation, and that the name of Lucent or any of its entities
not be used in advertising or publicity pertaining to
distribution of the software without specific, written prior
permission.

LUCENT

DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL LUCENT OR ANY OF ITS ENTITIES BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

(4) Advanced Micro Devices

Copyright 1989, 1990 Advanced Micro Devices, Inc.

This software is the property of Advanced Micro Devices, Inc (AMD) which specifically grants the user the right to modify, use and distribute this software provided this notice is not removed or altered. All other rights are reserved by AMD.

AMD MAKES NO WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, WITH REGARD TO THIS SOFTWARE. IN NO EVENT SHALL AMD BE LIABLE FOR INCIDENTAL OR CONSEQUENTIAL DAMAGES IN CONNECTION WITH OR ARISING FROM THE FURNISHING, PERFORMANCE, OR USE OF THIS SOFTWARE.

So that all may benefit from your experience, please report any problems or suggestions about this software to the 29K Technical Support Center at 800-29-29-AMD (800-292-9263) in the USA, or 0800-89-1131 in the UK, or 0031-11-1129 in Japan, toll free. The direct dial number is 512-462-4118.

Advanced Micro Devices, Inc.
29K Support Products
Mail Stop 573
5900 E. Ben White Blvd.
Austin, TX 78741
800-292-9263

(5) C.W. Sandmann

Copyright (C) 1993 C.W. Sandmann

This file may be freely distributed as long as the author's name remains.

(6) Eric Backus

(C) Copyright 1992 Eric Backus

This software may be used freely so long as this copyright notice is left intact. There is no warrantee on this software.

(7) Sun Microsystems

Copyright (C) 1993 by Sun Microsystems, Inc. All rights reserved.

Developed at SunPro, a Sun Microsystems, Inc. business.

Permission to use, copy, modify, and distribute this software is freely granted, provided that this notice is preserved.

(8) Hewlett Packard

(c) Copyright 1986 HEWLETT-PACKARD COMPANY

To anyone who acknowledges that this file is provided "AS IS" without any express or implied warranty:

permission to use, copy, modify, and distribute this file for any purpose is hereby granted without fee, provided that the above copyright notice and this notice appears in all copies, and that the name of Hewlett-Packard Company not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Hewlett-Packard Company makes no representations about the suitability of this software for any purpose.

(9) Hans-Peter Nilsson

Copyright (C) 2001 Hans-Peter Nilsson

Permission to use, copy, modify, and distribute this software is freely granted, provided that the above copyright notice, this notice and the following disclaimer are preserved with no changes.

THIS SOFTWARE IS PROVIDED ``AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED

WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

(10) Stephane Carrez (m68hc11-elf/m68hc12-elf targets only)

Copyright (C) 1999, 2000, 2001, 2002 Stephane Carrez (stcarrez@nerim.fr)

The authors hereby grant permission to use, copy, modify, distribute, and license this software and its documentation for any purpose, provided that existing copyright notices are retained in all copies and that this

notice is included verbatim in any distributions. No written agreement, license, or royalty fee is required for any of the authorized uses. Modifications to this software may be copyrighted by their authors and need not follow the licensing terms described here, provided that the new terms are clearly indicated on the first page of each file where they apply.

(11) Christopher G. Demetriou

Copyright (c) 2001 Christopher G. Demetriou
All rights reserved.

Redistribution and use in source and binary forms, with or without modification,
are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(12) SuperH, Inc.

Copyright 2002 SuperH, Inc. All rights reserved

This software is the property of SuperH, Inc (SuperH) which specifically grants the user the right to modify, use and distribute this software provided this notice is not removed or altered. All other rights are reserved by SuperH.

SUPERH MAKES NO WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, WITH REGARD TO THIS SOFTWARE. IN NO EVENT SHALL SUPERH BE LIABLE FOR INDIRECT, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES IN CONNECTION WITH OR ARISING FROM

THE FURNISHING, PERFORMANCE, OR USE OF THIS SOFTWARE.

So that all may benefit from your experience, please report any problems or suggestions about this software to the SuperH Support Center via e-mail at softwaresupport@superh.com .

SuperH, Inc.
405 River Oaks Parkway
San Jose
CA 95134
USA

(13) Royal Institute of Technology

Copyright (c) 1999 Kungliga Tekniska Hgskolan
(Royal Institute of Technology, Stockholm, Sweden).
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of KTH nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY KTH AND ITS CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL KTH OR ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(14) Alexey Zelkin

Copyright (c) 2000, 2001 Alexey Zelkin <phantom@FreeBSD.org>

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(15) Andrey A. Chernov

Copyright

(C) 1997 by Andrey A. Chernov, Moscow, Russia.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS

OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

(16) FreeBSD

Copyright (c) 1997-2002 FreeBSD Project.
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in the
documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND
ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
IMPLIED

WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE
FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

(17) S. L. Moshier

Author: S. L. Moshier.

Copyright (c) 1984,2000 S.L. Moshier

Permission to use, copy, modify, and distribute this software for any
purpose without fee is hereby granted, provided that this entire notice
is included in all copies of any software which is or includes a copy
or modification of this software and in all copies of the supporting
documentation for such software.

THIS SOFTWARE
IS BEING PROVIDED "AS IS", WITHOUT ANY EXPRESS OR IMPLIED
WARRANTY. IN PARTICULAR, THE AUTHOR MAKES NO REPRESENTATION

OR WARRANTY OF ANY KIND CONCERNING THE MERCHANTABILITY OF THIS SOFTWARE OR ITS FITNESS FOR ANY PARTICULAR PURPOSE.

(18) Citrus Project

Copyright (c)1999 Citrus Project,
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(19) Todd C. Miller

Copyright (c) 1998 Todd C. Miller <Todd.Miller@courtesan.com>
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES,

INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(20) DJ Delorie (i386)

Copyright

(C) 1991 DJ Delorie

All rights reserved.

Redistribution and use in source and binary forms is permitted provided that the above copyright notice and following paragraph are duplicated in all such forms.

This file is distributed WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

(21) Free Software Foundation LGPL License (*-linux* targets only)

Copyright (C) 1990-1999, 2000, 2001 Free Software Foundation, Inc.

This file is part of the GNU C Library.

Contributed by Mark Kettenis <kettenis@phys.uva.nl>, 1997.

The GNU C Library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

The GNU C Library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with the GNU C Library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

(22) Xavier Leroy LGPL License (i[3456]86-*-linux* targets only)

Copyright (C) 1996 Xavier Leroy (Xavier.Leroy@inria.fr)

This program is free software; you can redistribute it and/or

modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

(23) Intel (i960)

Copyright (c)
1993 Intel Corporation

Intel hereby grants you permission to copy, modify, and distribute this software and its documentation. Intel grants this permission provided that the above copyright notice appears in all copies and that both the copyright notice and this permission notice appear in supporting documentation. In addition, Intel grants this permission provided that you prominently mark as "not part of the original" any modifications made to this software or documentation, and that the name of Intel Corporation not be used in advertising or publicity pertaining to distribution of the software or the documentation without specific, written prior permission.

Intel Corporation provides this AS IS, WITHOUT ANY WARRANTY, EXPRESS OR IMPLIED, INCLUDING, WITHOUT LIMITATION, ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. Intel makes no guarantee or representations regarding the use of, or the results of the use of, the software and documentation in terms of correctness, accuracy, reliability, currentness, or otherwise; and you rely on the software, documentation and results solely at your own risk.

IN NO EVENT SHALL INTEL BE LIABLE FOR ANY LOSS OF USE, LOSS OF BUSINESS, LOSS OF PROFITS, INDIRECT, INCIDENTAL, SPECIAL OR CONSEQUENTIAL DAMAGES OF ANY KIND. IN NO EVENT SHALL INTEL'S TOTAL LIABILITY EXCEED THE SUM PAID TO INTEL FOR THE PRODUCT LICENSED HEREUNDER.

(24) Hewlett-Packard (hppa targets only)

(c) Copyright 1986 HEWLETT-PACKARD COMPANY

To anyone who acknowledges that this file is provided "AS IS" without any express or implied warranty:

permission to use, copy, modify, and distribute this file for any purpose is hereby granted without fee, provided that the above copyright notice and this notice appears in all

copies, and that the name of Hewlett-Packard Company not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Hewlett-Packard Company makes no representations about the suitability of this software for any purpose.

(25) Henry Spencer (only *-linux targets)

Copyright 1992, 1993, 1994 Henry Spencer. All rights reserved. This software is not subject to any license of the American Telephone and Telegraph Company or of the Regents of the University of California.

Permission is granted to anyone to use this software for any purpose on any computer system, and to alter it and redistribute it, subject to the following restrictions:

1. The author is not responsible for the consequences of use of this software, no matter how awful, even if they arise from flaws in it.
2. The origin of this software must not be misrepresented, either by explicit claim or by omission. Since few users ever read sources, credits must appear in the documentation.
3. Altered versions must be plainly marked as such, and must not be misrepresented as being the original software. Since few users ever read sources, credits must appear in the documentation.
4. This notice may not be removed or altered.

(26) Mike Barcroft

Copyright (c) 2001 Mike Barcroft <mike@FreeBSD.org>
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES

(INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(27) Konstantin Chuguev (--enable-newlib-iconv)

Copyright (c) 1999, 2000

Konstantin Chuguev. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS

PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

iconv (Charset Conversion Library) v2.0

(28) Artem Bityuckiy (--enable-newlib-iconv)

Copyright (c) 2003, Artem B. Bityuckiy, SoftMine Corporation.

Rights transferred to Franklin Electronic Publishers.

Redistribution and use in source and binary forms, with or without modification,

are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(29) IBM, Sony, Toshiba (only spu-* targets)

(C) Copyright 2001,2006,
International Business Machines Corporation,
Sony Computer Entertainment, Incorporated,
Toshiba Corporation,

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * Neither the names of the copyright holders nor the names of their contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS

INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(30) - Alex Tatmanjants (targets using libc/posix)

Copyright (c) 1995 Alex Tatmanjants <alex@elvisti.kiev.ua>
at Electronni Visti
IA, Kiev, Ukraine.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(31) - M. Warner Losh (targets using libc/posix)

Copyright (c) 1998, M. Warner Losh <imp@freebsd.org>
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(32) - Andrey A. Chernov (targets using libc/posix)

Copyright (C) 1996 by Andrey A. Chernov, Moscow, Russia.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(33) - Daniel Eischen (targets using libc/posix)

Copyright (c) 2001 Daniel Eischen <deischen@FreeBSD.org>.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions

are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(34) - Jon Beniston (only lm32-* targets)

Contributed by Jon Beniston <jon@beniston.com>

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(35) - ARM Ltd (arm and thumb variant targets only)

Copyright (c) 2009 ARM Ltd
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the company may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY ARM LTD "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL ARM LTD BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The libgloss subdirectory is a collection of software from several sources.

Each file may have its own copyright/license that is embedded in the source file. Unless otherwise noted in the body of the source file(s), the following copyright notices will apply to the contents of the libgloss subdirectory:

(1) Red Hat Incorporated

Copyright (c) 1994-2007 Red Hat, Inc. All rights reserved.

This copyrighted material is made available to anyone wishing to use, modify, copy, or redistribute it subject to the terms and conditions of the BSD License. This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY expressed or implied, including the implied warranties of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. A copy of this license is available at <http://www.opensource.org/licenses>. Any Red Hat trademarks that are incorporated in the source code or documentation are not subject to the BSD License and may only be used or replicated with the express

permission of
Red Hat, Inc.

(2) University of California, Berkeley

Copyright (c) 1981-2000 The Regents of the University of California.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification,
are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice,
this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice,
this list of conditions and the following disclaimer in the documentation
and/or other materials provided with the distribution.
- * Neither the name of the University nor the names of its contributors may
be used to endorse or promote products derived from this software without
specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS"
AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT
LIMITED TO, THE IMPLIED

WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE
DISCLAIMED.

IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT,
INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT

NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR
PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE
POSSIBILITY
OF SUCH DAMAGE.

(3) DJ Delorie

Copyright (C) 1993 DJ Delorie
All rights reserved.

Redistribution and use in source and binary forms is permitted
provided that the above copyright notice and following paragraph are
duplicated in all such forms.

This file is distributed WITHOUT ANY WARRANTY; without even the implied
warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

(4)

GPL (fr30 directory only)

Copyright (C) 1998 Free Software Foundation, Inc.
Contributed by Cygnus Solutions.

This file is part of GNU CC.

GNU CC is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version.

GNU CC is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with GNU CC; see the file COPYING. If not, write to the Free Software Foundation, 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.

(5) Advanced Micro Devices

Copyright 1989, 1990 Advanced Micro Devices, Inc.

This software is the property of Advanced Micro Devices, Inc (AMD) which specifically grants the user the right to modify, use and distribute this software provided this notice is not removed or altered. All other rights are reserved by AMD.

AMD MAKES NO WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, WITH REGARD TO THIS SOFTWARE. IN NO EVENT SHALL AMD BE LIABLE FOR INCIDENTAL OR CONSEQUENTIAL DAMAGES IN CONNECTION WITH OR ARISING FROM THE FURNISHING, PERFORMANCE, OR USE OF THIS SOFTWARE.

So that all may benefit from your experience, please report any problems or suggestions about this software to the 29K Technical Support Center at 800-29-29-AMD (800-292-9263) in the USA, or 0800-89-1131 in the UK, or 0031-11-1129 in Japan, toll free. The direct dial number is 512-462-4118.

Advanced Micro Devices, Inc.
29K Support Products
Mail Stop 573
5900 E. Ben White Blvd.
Austin, TX 78741
800-292-9263

(6) Array Technology Corporation and MIPS (mips/lsi33k-stub.h)

COPYRIGHT (C) 1991, 1992 ARRAY TECHNOLOGY CORPORATION
All Rights Reserved

This software is confidential information
which is proprietary to and
a trade secret of ARRAY Technology Corporation. Use, duplication, or
disclosure is subject to the terms of a separate license agreement.

Copyright 1985 by MIPS Computer Systems, Inc.

(7) University of Utah and the Computer Systems Laboratory (CSL)
[applies only to hppa*-*-pro* targets]

Copyright (c) 1990,1994 The University of Utah and
the Computer Systems Laboratory (CSL). All rights reserved.

Permission to use, copy, modify and distribute this software is hereby
granted provided that (1) source code retains these copyright, permission,
and disclaimer notices, and (2) redistributions including binaries
reproduce the notices in supporting documentation, and (3) all advertising
materials mentioning features or use of this software display the following
acknowledgement: ``This product includes software developed by the
Computer Systems Laboratory at the University of Utah."

THE UNIVERSITY OF UTAH AND CSL ALLOW FREE USE OF THIS SOFTWARE IN ITS "AS
IS"

CONDITION. THE UNIVERSITY OF UTAH AND CSL DISCLAIM ANY LIABILITY OF
ANY KIND FOR ANY DAMAGES WHATSOEVER RESULTING FROM THE USE OF THIS SOFTWARE.

CSL requests users of this software to return to csl-dist@cs.utah.edu any
improvements that they make and grant CSL redistribution rights.

(8) Sun Microsystems

Copyright (C) 1993 by Sun Microsystems, Inc. All rights reserved.

Developed at SunPro, a Sun Microsystems, Inc. business.
Permission to use, copy, modify, and distribute this
software is freely granted, provided that this notice is preserved.

(9) Hewlett Packard

(c) Copyright 1986 HEWLETT-PACKARD COMPANY

To anyone who acknowledges that this file is provided "AS IS"
without any express or implied warranty:

permission to use, copy, modify, and distribute this file for any purpose is hereby granted without fee, provided that the above copyright notice and this notice appears in all copies, and that the name of Hewlett-Packard Company not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Hewlett-Packard Company makes no representations about the suitability of this software for any purpose.

(10) Hans-Peter Nilsson

Copyright (C) 2001 Hans-Peter Nilsson

Permission to use, copy, modify, and distribute this software is freely granted, provided that the above copyright notice, this notice and the following disclaimer are preserved with no changes.

THIS SOFTWARE IS PROVIDED ``AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

(11) IBM Corp. spu processor (only spu-* targets)

(C) Copyright IBM Corp. 2005, 2006

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

* Neither the name of IBM nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR

CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT,

STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(12) Jon Beniston (only lm32-* targets)

Contributed by Jon Beniston <jon@beniston.com>

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

(13) - Xilinx, Inc. (powerpc-* targets)

Copyright (c) 2004, 2009 Xilinx, Inc. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer

in the
documentation and/or other materials provided with the distribution.

3. Neither the name of Xilinx nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDER AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

@c The GNU Free Documentation License.

@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,

@c hence no sectioning command or @node.

@display

Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.

@uref{http://fsf.org/}

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other functional and useful document @dfn{free} in the sense of freedom: to assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative works of the document

must themselves be free in the same sense. It complements the GNU General Public License, which is a copyleft license designed for free software.

We have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The ``Document'', below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as ``you''. You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A ``Modified Version'' of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A ``Secondary Section'' is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The ``Invariant Sections'' are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant

Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not "Transparent" is called "Opaque".

Examples of suitable formats for Transparent copies include plain `@sc{ascii}` without markup, Texinfo input format, `La@TeX{}` input format, `@acronym{SGML}` or `@acronym{XML}` using a publicly available `@acronym{DTD}`, and standard-conforming simple `@acronym{HTML}`, PostScript or `@acronym{PDF}` designed for human modification. Examples of transparent image formats include `@acronym{PNG}`, `@acronym{XCF}` and `@acronym{JPG}`. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, `@acronym{SGML}` or `@acronym{XML}` for which the `@acronym{DTD}` and/or processing tools are not generally available, and the machine-generated `@acronym{HTML}`, PostScript or `@acronym{PDF}` produced by some word processors for output purposes only.

The "Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, "Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The "publisher" means any person or entity that distributes copies of the Document to the public.

A section "Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in

another language. (Here XYZ stands for a specific section name mentioned below, such as ``Acknowledgements'', ``Dedications'', ``Endorsements'', or ``History''.) To ``Preserve the Title'' of such a section when you modify the Document means that it remains a section ``Entitled XYZ'' according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible.

You may add other material on the covers in addition.

Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit

legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material.

If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that

this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from

those of previous versions

(which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements'' or ``Dedications'', Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements''. Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements'' or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements'', provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number. Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History'' in the various original documents, forming one section Entitled ``History''; likewise combine any sections Entitled ``Acknowledgements'', and any sections Entitled ``Dedications''. You must delete all sections Entitled ``Endorsements.''

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an ``aggregate'' if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit.

When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to

60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See <http://www.gnu.org/copyleft/>.

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC")

contained in the site means any set of copyrightable works thus published on the MMC site.

``CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

``Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is ``eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

@smallexample

@group

Copyright (C) @var{year} @var{your name}.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled ``GNU Free Documentation License".

@end group

@end smallexample

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the ``with@dots{ }Texts." line with this:

```
@smallexample
@group
  with the Invariant Sections being @var{list their titles}, with
  the Front-Cover
Texts being @var{list}, and with the Back-Cover Texts
  being @var{list}.
@end group
@end smallexample
```

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

```
@c Local Variables:
@c ispell-local-pdict: "ispell-dict"
@c End:
GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999
```

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

**GNU LESSER GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION**

0. This License Agreement applies to any software library or other

program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1

above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be

linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6.

Any

executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2)

will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining

where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any

such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO

WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU

Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You

should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in

a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because

of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed

under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a

portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility

is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6,

whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major

components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library

subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute

the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time.

Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year>  
<name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

```
<signature of Ty Coon>, 1 April 1990  
Ty Coon, President of Vice
```

That's all there is to it!

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a

computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but

which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive

interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in

the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the

Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or

- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the

Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the

patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM

IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

GNU LESSER GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <http://fsf.org/>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

This version of the GNU Lesser General Public License incorporates the terms and conditions of version 3 of the GNU General Public License, supplemented by the additional permissions listed below.

0. Additional Definitions.

As used herein, "this License" refers to version 3 of the GNU Lesser General Public License, and the "GNU GPL" refers to version 3 of the GNU General Public License.

"The Library" refers to a covered work governed by this License, other than an Application or a Combined Work as defined below.

An "Application" is any work that makes use of an interface provided by the Library, but which is not otherwise based on the Library. Defining a subclass of a class defined by the Library is deemed a mode of using an interface provided by the Library.

A "Combined Work" is a work produced by combining or linking an Application with the Library. The particular version of the Library with which the Combined Work was made is also called the "Linked Version".

The "Minimal Corresponding Source" for a Combined Work means the Corresponding Source for the Combined Work, excluding any source code for portions of the Combined Work that, considered in isolation, are based on the Application, and not on the Linked Version.

The "Corresponding Application Code" for a Combined Work means the object code and/or source code for the Application, including any data and utility programs needed for reproducing the Combined Work from the Application, but excluding the System Libraries of the Combined Work.

1. Exception to Section 3 of the GNU GPL.

You may convey a covered work under sections 3 and 4 of this License without being bound by section 3 of the GNU GPL.

2. Conveying Modified Versions.

If you modify a copy of the Library, and, in your modifications, a facility refers to a function or data to be supplied by an Application that uses the facility (other than as an argument passed when the facility is invoked), then you may convey a copy of the modified version:

a) under this License, provided that you make a good faith effort to ensure that, in the event an Application does not supply the function or data, the facility still operates, and performs whatever part of its purpose remains meaningful, or

b) under the GNU GPL, with none of the additional permissions of

this License applicable to that copy.

3. Object Code Incorporating Material from Library Header Files.

The object code form of an Application may incorporate material from a header file that is part of the Library. You may convey such object code under terms of your choice, provided that, if the incorporated material is not limited to numerical parameters, data structure layouts and accessors, or small macros, inline functions and templates (ten or fewer lines in length), you do both of the following:

- a) Give prominent notice with each copy of the object code that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the object code with a copy of the GNU GPL and this license document.

4. Combined Works.

You may convey a Combined Work under terms of your choice that, taken together, effectively do not restrict modification of the portions of the Library contained in the Combined Work and reverse engineering for debugging such modifications, if you also do each of the following:

- a) Give prominent notice with each copy of the Combined Work that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the Combined Work with a copy of the GNU GPL and this license document.
- c) For a Combined Work that displays copyright notices during execution, include the copyright notice for the Library among these notices, as well as a reference directing the user to the copies of the GNU GPL and this license document.
- d) Do one of the following:
 - 0) Convey the Minimal Corresponding Source under the terms of this License, and the Corresponding Application Code in a form suitable for, and under terms that permit, the user to recombine or relink the Application with a modified version of the Linked Version to produce a modified Combined Work, in the manner specified by section 6 of the GNU GPL for conveying

Corresponding Source.

1) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (a) uses at run time a copy of the Library already present on the user's computer system, and (b) will operate properly with a modified version of the Library that is interface-compatible with the Linked Version.

e) Provide Installation Information, but only if you would otherwise be required to provide such information under section 6 of the GNU GPL, and only to the extent that such information is necessary to install and execute a modified version of the Combined Work produced by recombining or relinking the Application with a modified version of the Linked Version. (If you use option 4d0, the Installation Information must accompany the Minimal Corresponding Source and Corresponding Application Code. If you use option 4d1, you must provide the Installation Information in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.)

5. Combined Libraries.

You may place library facilities that are a work based on the Library side by side in a single library together with other library facilities that are not Applications and are not covered by this License, and convey such a combined library under terms of your choice, if you do both of the following:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities, conveyed under the terms of this License.
- b) Give prominent notice with the combined library that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

6. Revised Versions of the GNU Lesser General Public License.

The Free Software Foundation may publish revised and/or new versions of the GNU Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library as you received it specifies that a certain numbered version

of the GNU Lesser General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that published version or of any later version published by the Free Software Foundation. If the Library as you received it does not specify a version number of the GNU Lesser General Public License, you may choose any version of the GNU Lesser General Public License ever published by the Free Software Foundation.

If the Library as you received it specifies that a proxy can decide whether future versions of the GNU Lesser General Public License shall apply, that proxy's public statement of acceptance of any version is permanent authorization for you to choose that version for the Library.

@node Library Copying

@appendixsec GNU LESSER GENERAL PUBLIC LICENSE

@cindex LGPL, Lesser General Public License

@center Version 2.1, February 1999

@display

Copyright © 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street - Fifth Floor, Boston, MA 02110-1301, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

@end display

@appendixsubsec Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software---to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software---typically libraries---of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,

not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a

combined work, a derivative of the original library.

The ordinary

General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the @dfn{Lesser} General Public License because it does @emph{Less} to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a ``work based on the library" and a ``work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

@iftex

@appendixsubsec TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@end iftex

@ifinfo

@center GNU LESSER GENERAL PUBLIC LICENSE

@center TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@end ifinfo

@enumerate 0

@item

This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called ``this License"). Each licensee is addressed as ``you".

A ``library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The ``Library", below, refers to any such software library or work which has been distributed under these terms. A ``work based on the Library" means

either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term ``modification".)

``Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether

that is true depends on what the Library does and what the program that uses the Library does.

@item

You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

@item

You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

@enumerate a

@item

The modified work must itself be a software library.

@item

You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

@item

You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

@item

If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

@end enumerate

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of

this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

@item

You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

@item

You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

@item

A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a ``work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However,

linking a ``work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a ``work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a ``work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work.

(Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

@item

As an exception to the Sections above, you may also combine or link a ``work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices,

you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one

of these things:

@enumerate a

@item

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable ``work that uses the Library'', as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

@item

Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

@item

Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

@item

If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

@item

Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

@end enumerate

For an executable, the required form of the ``work that uses the Library'' must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major

components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

@item

You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

@enumerate a

@item

Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

@item

Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

@end enumerate

@item

You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

@item

You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the

Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

@item

Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

@item

If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

@item

If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded.

In such case, this License incorporates the limitation as if written in the body of this License.

@item

The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and ``any later version'', you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

@item

If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

@iftex

@heading NO WARRANTY

@end iftex

@ifinfo

@center NO WARRANTY

@end ifinfo

@item

BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY ``AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR

PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

@item

IN

NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@end enumerate

@iftex

@heading END OF TERMS AND CONDITIONS

@end iftex

@ifinfo

@center END OF TERMS AND CONDITIONS

@end ifinfo

@page

@appendixsubsec How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the ``copyright" line and a pointer to where the full notice is found.

@smallexample

@var{one line to give the library's name and an idea of what it does.}

Copyright (C) @var{year} @var{name of author}

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.
@end smallexample

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a ``copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

@smallexample
Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

@var{signature of Ty Coon}, 1 April 1990
Ty Coon, President of Vice
@end smallexample

That's all there is to it!
(This file is under construction.) -*- text -*-

If you've contributed to gas and your name isn't listed here, it is not meant as a slight. I just don't know about it. Email me, nickc@redhat.com and I'll correct the situation.

This file will eventually be deleted: The general info will go into the documentation, and info on specific files will go into an AUTHORS file, as requested by the FSF.

+++++

Dean Elsner wrote the original gas for vax. [more details?]

Jay Fenlason maintained gas for a while, adding support for gdb-specific debug information and the 68k series machines, most of the preprocessing pass, and extensive changes in messages.c, input-file.c, write.c.

K. Richard Pixley maintained gas for a while, adding various

enhancements and many bug fixes, including merging support for several processors, breaking gas up to handle multiple object file format backends (including heavy rewrite, testing, an integration of the coff and b.out backends), adding configuration including heavy testing and verification of cross assemblers and file splits and renaming, converted gas to strictly ansi C including full prototypes, added support for m680[34]0 & cpu32, considerable work on i960 including a coff port (including considerable amounts of reverse engineering), a sparc opcode file rewrite, decstation, rs6000, and hp300hpux host ports, updated "know" assertions and made them work, much other reorganization, cleanup, and lint.

Ken Raeburn wrote the high-level BFD interface code to replace most of the code in format-specific I/O modules.

The original Vax-VMS support was contributed by David L. Kashtan. Eric Youngdale and Pat Rankin have done much work with it since.

The Intel 80386 machine description was written by Eliot Dresselhaus.

Minh Tran-Le at IntelliCorp contributed some AIX 386 support.

The Motorola 88k machine description was contributed by Devon Bowen of Buffalo University and Torbjorn Granlund of the Swedish Institute of Computer Science.

Keith

Knowles at the Open Software Foundation wrote the original MIPS back end (tc-mips.c, tc-mips.h), and contributed Rose format support that hasn't been merged in yet. Ralph Campbell worked with the MIPS code to support a.out format.

Support for the Zilog Z8k and Hitachi H8/300, H8/500 and SH processors (tc-z8k, tc-h8300, tc-h8500, tc-sh), and IEEE 695 object file format (obj-ieee), was written by Steve Chamberlain of Cygnus Solutions. Steve also modified the COFF back end (obj-coffbfd) to use BFD for some low-level operations, for use with the Hitachi, 29k and Zilog targets.

John Gilmore built the AMD 29000 support, added .include support, and simplified the configuration of which versions accept which pseudo-ops. He updated the 68k machine description so that Motorola's opcodes always produced fixed-size instructions (e.g. jsr), while synthetic instructions remained shrinkable (jbsr). John fixed many bugs, including true tested cross-compilation support, and one bug in relaxation

that took a week and required the proverbial one-bit fix.

Ian Lance Taylor of Cygnus Solutions merged the Motorola and MIT syntaxes for the 68k, completed support for some COFF targets (68k, i386 SVR3, and SCO Unix), wrote the ECOFF support based on Michael Meissner's mips-tfile program, wrote the PowerPC and RS/6000 support, and made a few other minor patches. He handled the binutils releases for versions 2.7 through 2.9.

David Edelsohn contributed fixes for the PowerPC and AIX support.

Steve Chamberlain made gas able to generate listings.

Support for the HP9000/300 was contributed by Glenn Engel of HP.

Support for ELF format files has been worked on by Mark Eichin of Cygnus Solutions (original, incomplete implementation), Pete Hoogenboom at the University of Utah (HPPA mainly), Michael Meissner of the Open Software Foundation (i386 mainly), and Ken Raeburn of Cygnus Solutions (sparc, initial 64-bit support).

Several engineers at Cygnus Solutions have also provided many small bug fixes and configuration enhancements.

The initial Alpha support was contributed by Carnegie-Mellon University. Additional work was done by Ken Raeburn of Cygnus Solutions. Richard Henderson then rewrote much of the Alpha support.

Ian Dall updated the support code for the National Semiconductor 32000 series, and added support for Mach 3 and NetBSD running on the PC532.

Klaus Kaempf ported the assembler and the binutils to openVMS/Alpha.

Steve Haworth contributed the support for the Texas Instruction c30 (tms320c30).

H.J. Lu has contributed many patches and much testing.

Alan Modra reworked much of the i386 backend, improving the error checking, updating the code, and improving the 16 bit support, using patches from the work of Martynas Kunigelis and H.J. Lu.

Many others have contributed large or small bugfixes and enhancements. If you've contributed significant work and are not mentioned on this list, and want to be, let us know. Some of the history has been lost; we aren't intentionally leaving anyone out.

1.192 libnsI 2.12

1.192.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence
the version number 2.1.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software packages--typically libraries--of the
Free Software Foundation and other authors who
decide to use it. You
can use it too, but we suggest you first think carefully about whether
this license or the ordinary General Public License is the better
strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of
it in new free programs; and that you are informed that you can do
these things.

To protect your rights, we need to make restrictions that forbid
distributors to deny you these rights or to ask you to surrender these
rights. These restrictions translate to certain responsibilities for
you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library,
whether gratis
or for a fee, you must give the recipients all the rights that we gave

you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into

another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that,

in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of

the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)
- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these

materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally

distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if

you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse

you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system

which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in

certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR

CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the

library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.193 iputils 20071127-17.e16_4

1.193.1 Available under license :

No license file was found, but licenses were detected in source scan.

/*-

* Copyright (c) 1990, 1993

* The Regents of the University of California. All rights reserved.

*

* This code is derived from software contributed to Berkeley by

* Van Jacobson.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software

* must display the following acknowledgement:

* This product includes software developed by the University of

* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

* may be used to endorse or promote products derived from this software

* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND

* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE

* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS

* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT

* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY

* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF

* SUCH DAMAGE.

*/

Found in path(s):

*

/opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/traceroute6.c

No license file was found, but licenses were detected in source scan.

and distributed under different licenses. For details look into corresponding

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/iputils.db

No license file was found, but licenses were detected in source scan.

/*

* Copyright (c) 1983 Regents of the University of California.

* All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in the

* documentation and/or other materials provided with the distribution.

* 3. All advertising materials mentioning features or use of this software

* must display the following acknowledgement:

* This product includes software developed by the University of

* California, Berkeley and its contributors.

* 4. Neither the name of the University nor the names of its contributors

* may be used

to endorse or promote products derived from this software

* without specific prior written permission.

*

* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND

* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE

* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE

* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL

* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS

* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)

* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT

* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY

* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF

* SUCH DAMAGE.

*/

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/tftpd.c

*

/opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/tftpsubs.c

No license file was found, but licenses were detected in source scan.

<refentry id="tftpd">

<refmeta>

<refentrytitle>tftpd</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

<refnamediv>

<refname>tftpd</refname>

<refpurpose>Trivial File Transfer Protocol server</refpurpose>

</refnamediv>

<refsynopsisdiv>

<cmdsynopsis>

<command>tftpd</command>

<arg choice="req"><replaceable/directory/</arg>

</cmdsynopsis>

</refsynopsisdiv>

<refsect1><title>DESCRIPTION</title>

<para>

<command/tftpd/ is a server which supports the DARPA

Trivial File Transfer Protocol

(<ulink url="ftp://ftp.isi.edu/in-notes/rfc1350.txt">RFC1350</ulink>).

The TFTP server is started

by <citerefentry><refentrytitle/inetd/<manvolnum/8/</citerefentry>.

</para>

<para>

<replaceable/directory/ is required argument; if it is not given

<command/tftpd/ aborts. This path is prepended to any file name requested via TFTP protocol, effectively chrooting <command/tftpd/ to this directory.

File

names are validated not to escape out of this directory, however administrator may configure such escape using symbolic links.

</para>

<para>

It is in difference of variants of <command/tftpd/ usually distributed

with unix-like systems, which take a list of directories and match file names to start from one of given prefixes or to some random default, when no arguments were given. There are two reasons not to behave in this way: first, it is inconvenient, clients are not expected to know something about layout of filesystem on server host. And second, TFTP protocol is not a tool for browsing of server's filesystem, it is just an agent allowing to boot dumb clients.

</para>

<para>

In the case when <command/tftpd/ is used together with

<link linkend="rarpd">

<citerefentry><refentrytitle/rarpd/<manvolnum/8/</citerefentry></link>,</link>

tftp directories in these services should coincide and it is expected

that each client booted via TFTP has boot image corresponding

its IP address with

an architecture suffix following Sun Microsystems

conventions. See

<link linkend="rarpd">

<citerefentry><refentrytitle/rarpd/<manvolnum/8/</citerefentry></link>

for more details.

</para>

</refsect1>

<refsect1><title>SECURITY</title>

<para>

TFTP protocol does not provide any authentication.

Due to this capital flaw <command/tftpd/ is not able to restrict

access to files and will allow only publically readable

files to be accessed. Files may be written only if they already

exist and are publically writable.

</para>

<para>

Impact is evident, directory exported via TFTP <emphasis/must not/

contain sensitive information of any kind, everyone is allowed

to read it as soon as a client is allowed. Boot images do not contain

such information as rule, however you should think twice before

publishing f.e. Cisco IOS config files via TFTP, they contain

<emphasis/unencrypted/ passwords and may contain some information

about the network, which you were not going to make public.

</para>

<para>

The

<command/tftpd/ server should be executed by <command/inetd/

with dropped root privileges, namely with a user ID giving minimal

access to files published in tftp directory. If it is executed

as superuser occasionally, `<command/tftpd/` drops its UID and GID to 65534, which is most likely not the thing which you expect. However, this is not very essential; remember, only files accessible for everyone can be read or written via TFTP.

</para>

</refsect1>

<refsect1><title>SEE ALSO</title>

<para>

<link linkend="rarpd">

<citerefentry><refentrytitle/rarpd/<manvolnum/8/</citerefentry></link>,</link>

<citerefentry><refentrytitle/tftp/<manvolnum/1/</citerefentry>,</link>

<citerefentry><refentrytitle/inetd/<manvolnum/8/</citerefentry>.</link>

</para>

</refsect1>

<refsect1><title>HISTORY</title>

<para>

The `<command/tftpd/` command appeared in 4.2BSD. The source in `iputils` is cleaned up both syntactically (ANSIized) and semantically (UDP socket IO).

</para>

<para>

It is distributed with `iputils` mostly as good demo of an interesting feature

(`<constant/MSG_CONFIRM/`) allowing to boot long images by dumb clients not answering ARP requests until they are finally booted.

However, this is full functional and can be used in production.

</para>

</refsect1>

<refsect1><title>AVAILABILITY</title>

<para>

`<command/tftpd/` is part of `<filename/iputils/` package

and the latest versions are available in source form at

<ulink url="http://www.skbuff.net/iputils/iputils-current.tar.bz2">

<http://www.skbuff.net/iputils/iputils-current.tar.bz2></ulink>.

</para>

</refsect1>

<![IGNORE[

<refsect1><title>COPYING</title>

<para>

<literallayout>

This documentation is free software; you can redistribute

it and/or modify it under the terms of the GNU General Public License Version 2.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

For more details
see the file COPYING in the source
distribution of Linux kernel of version 2.4.

</literallayout>

</literallayout>

</para>

</refsect1>

]]>

</refentry>

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwyj/iputils-s20071127/doc/tftpd.sgml

No license file was found, but licenses were detected in source scan.

<refentry id="arping">

<refmeta>

<refentrytitle>arping</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

<refnamediv>

<refname>arping</refname>

<refpurpose>send ARP REQUEST to a neighbour host</refpurpose>

</refnamediv>

<refsynopsisdiv>

<cmdsynopsis>

<command>arping</command>

<arg choice="opt"><option>-AbDfhqUV</option></arg>

<arg choice="opt">-c <replaceable/count/</arg>

<arg choice="opt">-w <replaceable/deadline/</arg>

<arg choice="opt">-s <replaceable/source/</arg>

<arg choice="req">-I <replaceable/interface/</arg>

<arg choice="req"><replaceable/destination/</arg>

</cmdsynopsis>

</refsynopsisdiv>

<refsect1><title>DESCRIPTION</title>

<para>

Ping <replaceable/destination/ on device <replaceable/interface/ by ARP packets, using source address <replaceable/source/.

</para>

</refsect1>

<refsect1><title>OPTIONS</title>

<variablelist>

<varlistentry>

<term><option/-A/</term>

<listitem><para>

The same as <option/-U/, but ARP REPLY packets used instead of ARP REQUEST.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-b</option></term>

<listitem><para>

Send only MAC level broadcasts. Normally <command/arping/ starts from sending broadcast, and switch to unicast after reply received.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option><anchor id="arping.count">-c <replaceable/count/</option></term>

<listitem><para>

Stop after sending <replaceable/count/ ARP REQUEST packets. With

<link linkend="arping.deadline"><replaceable/deadline/</link>

option, <command/arping/ waits for

<replaceable/count/ ARP REPLY packets, until the timeout expires.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option/-D/</term>

<listitem><para>

Duplicate address detection mode (DAD). See

<ulink url="ftp://ftp.isi.edu/in-notes/rfc2131.txt">RFC2131, 4.4.1</ulink>.

Returns 0, if DAD succeeded i.e. no replies
are received

</para></listitem>
</varlistentry>

<varlistentry>

<term><option>-f</option></term>
<listitem><para>

Finish after the first reply confirming that target is alive.

</para></listitem>
</varlistentry>

<varlistentry>

<term><option><anchor id="opt.interface">-I <replaceable/interface/</option></term>
<listitem><para>

Name of network device where to send ARP REQUEST packets. This option
is required.

</para></listitem>
</varlistentry>

<varlistentry>

<term><option>-h</option></term>
<listitem><para>

Print help page and exit.

</para></listitem>
</varlistentry>

<varlistentry>

<term><option>-q</term>
<listitem><para>

Quiet output. Nothing is displayed.

</para></listitem>
</varlistentry>

<varlistentry>

<term><option><anchor id="opt.source">-s <replaceable/source/</option></term>
<listitem><para>

IP source address to use in ARP packets.

If this option is absent, source address is:

<itemizedlist>
<listitem><para>

In DAD mode (with option

<option>-D/) set to 0.0.0.0.
</para></listitem>

<listitem><para>

In Unsolicited ARP mode (with options <option>-U/ or <option>-A/)

set to <replaceable/destination/.

</para></listitem>
<listitem><para>
Otherwise, it is calculated from routing tables.
</para></listitem>
</itemizedlist>
</para></listitem>
</varlistentry>

<varlistentry>
<term><option>-U</term>
<listitem><para>
Unsolicited ARP mode to update neighbours' ARP caches.
No replies are expected.
</para></listitem>
</varlistentry>

<varlistentry>
<term><option>-V</option></term>
<listitem><para>
Print version of the program and exit.
</para></listitem>
</varlistentry>

<varlistentry>
<term><option><anchor id="arping.deadline">-w <replaceable/timeout/</option></term>
<listitem><para>
Specify a timeout, in seconds, before
<command>arping/
exits regardless of how many
packets have been sent or received. In this case
<command>arping/
does not stop after
<link linkend="arping.count"><replaceable/count/</link>
packet
are sent, it waits either for
<link linkend="arping.deadline"><replaceable/timeout/</link>
expire or until
<link linkend="arping.count"><replaceable/count/</link>
probes are answered.
</para></listitem>
</varlistentry>
</variablelist>
</refsect1>

<refsect1><title>SEE ALSO</title>
<para>
<link linkend="ping">

<citerefentry><refentrytitle/ping/<manvolnum/8/</citerefentry></link>,
<link linkend="clockdiff">
<citerefentry><refentrytitle/clockdiff/<manvolnum/8/</citerefentry></link>,
<link linkend="tracepath">
<citerefentry><refentrytitle/tracepath/<manvolnum/8/</citerefentry></link>.
</para>
</refsect1>

<refsect1><title>AUTHOR</title>

<para>
<command/arping/ was written by
<ulink url="mailto:kuznet@ms2.inr.ac.ru">Alexey Kuznetsov
<kuznet@ms2.inr.ac.ru></ulink>.
It is now maintained by
<ulink url="mailto:yoshfuji@skbuff.net">YOSHIFUJI Hideaki
<yoshfuji@skbuff.net></ulink>.
</para>
</refsect1>

<refsect1><title>SECURITY</title>

<para>
<command/arping/
requires <constant/CAP_NET_RAWIO/ capability
to be executed. It is not recommended to be used as set-uid root,
because it allows user to modify ARP caches of neighbour hosts.
</para>
</refsect1>

<refsect1><title>AVAILABILITY</title>

<para>
<command/arping/ is part of <filename/iputils/ package
and the latest versions are available in source form at
<ulink url="http://www.skbuff.net/iputils/iputils-current.tar.bz2">
http://www.skbuff.net/iputils/iputils-current.tar.bz2</ulink>.
</para>
</refsect1>

<![IGNORE[

<refsect1><title>COPYING</title>

<para>
<literallayout>

This documentation is free software; you can redistribute
it and/or modify it under the terms of the GNU General Public
License Version 2.

This program is distributed in the hope that it will be
useful, but WITHOUT ANY WARRANTY; without even the implied
warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

See the GNU General Public License for more details.

For more details see the file COPYING in
the source
distribution of Linux kernel of version 2.4.

</literallayout>

</para>

</refsect1>

]]>

</refentry>

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/arping.sgml

No license file was found, but licenses were detected in source scan.

<refentry id="traceroute6">

<refmeta>

<refentrytitle>traceroute6</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

<refnamediv>

<refname>traceroute6</refname>

<refpurpose>traces path to a network host</refpurpose>

</refnamediv>

<refsynopsisdiv>

<cmdsynopsis>

<command>traceroute6</command>

<arg choice="opt"><option>-dnrvV</option></arg>

<arg choice="opt">-i <replaceable/interface/></arg>

<arg choice="opt">-m <replaceable/max_ttl/></arg>

<arg choice="opt">-p <replaceable/port/></arg>

<arg choice="opt">-q <replaceable/max_probes/></arg>

<arg choice="opt">-s <replaceable/source/></arg>

<arg choice="opt">-w <replaceable/wait time/></arg>

<arg choice="req"><replaceable/destination/></arg>

<arg choice="opt"><replaceable/size/></arg>

</cmdsynopsis>

</refsynopsisdiv>

<refsect1><title>DESCRIPTION</title>

<para>
Description can be found in
<citerefentry><refentrytitle/traceroute/<manvolnum/8/</citerefentry>,&br/>all
the references to IP replaced to IPv6. It is needless to copy
the description from there.
</para>
</refsect1>

<refsect1><title>SEE ALSO</title>
<para>
<citerefentry><refentrytitle/traceroute/<manvolnum/8/</citerefentry>,&br/><citerefentry><refentrytitle/tracepath/<manvolnum/8/</citerefentry>,&br/><citerefentry><refentrytitle/ping/<manvolnum/8/</citerefentry>.
</para>
</refsect1>

<refsect1><title>HISTORY</title>
<para>
This program has long history. Author of <command/traceroute/
is Van Jacobson and it first appeared in 1988. This clone is
based on a port of <command/traceroute/ to IPv6 published
in NRL IPv6 distribution in 1996. In turn, it was ported
to Linux by Pedro Roque. After this it was kept in sync by
<ulink url="mailto:kuznet@ms2.inr.ac.ru">Alexey Kuznetsov
<kuznet@ms2.inr.ac.ru></ulink>. And eventually entered
<command/iputils/ package.
</para>
</refsect1>

<refsect1><title>SECURITY</title>
<para>
<command/tracepath6/ requires <constant/CAP_NET_RAWIO/
capability
to be executed. It is safe to be used as set-uid root.
</para>
</refsect1>

<refsect1><title>AVAILABILITY</title>
<para>
<command/traceroute6/ is part of <filename/iputils/ package
and the latest versions are available in source form at
<ulink url="http://www.skbuff.net/iputils/iputils-current.tar.bz2">
http://www.skbuff.net/iputils/iputils-current.tar.bz2</ulink>.
</para>
</refsect1>

<![IGNORE[

<refsect1><title>COPYING</title>

<para>

<literallayout>

This documentation is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License Version 2.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

For more details see the file COPYING in the source distribution of Linux kernel of version 2.4.

</literallayout>

</para>

</refsect1>

]]>

</refentry>

Found

in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/traceroute6.shtml

No license file was found, but licenses were detected in source scan.

<refentry id="clockdiff">

<refmeta>

<refentrytitle>clockdiff</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

<refnamediv>

<refname>clockdiff</refname>

<refpurpose>measure clock difference between hosts</refpurpose>

</refnamediv>

<refsynopsisdiv>

<cmdsynopsis>

<command>clockdiff</command>

<arg choice="opt"><option>-o</option></arg>

<arg choice="opt"><option>-o1</option></arg>

<arg choice="req"><replaceable/destination/</arg>

</cmdsynopsis>
</refsynopsisdiv>

<refsect1><title>DESCRIPTION</title>

<para>

<command/clockdiff/ Measures clock difference between us and
<replaceable/destination/ with 1 msec resolution using ICMP TIMESTAMP

<link linkend="clockdiff.icmp-timestamp">[2]</link>

packets or, optionally, IP TIMESTAMP option

<link linkend="clockdiff.ip-timestamp">[3]</link>

option added to ICMP ECHO.

<link linkend="clockdiff.icmp-echo">[1]</link>

</para>

</refsect1>

<refsect1><title>OPTIONS</title>

<variablelist>

<varlistentry>

<term><option/-o/</term>

<listitem><para>

Use IP TIMESTAMP with ICMP ECHO instead of ICMP TIMESTAMP messages. It is useful with some destinations, which do not support ICMP TIMESTAMP (f.e. Solaris <2.4).

</para></listitem>

</varlistentry>

<varlistentry>

<term><option/-o1/</term>

<listitem><para>

Slightly different form of <option/-o/, namely it uses three-term IP TIMESTAMP with prespecified hop addresses instead of four term one.

What flavor works better depends on target host. Particularly,

<option/-o/ is better for Linux.

</para></listitem>

</varlistentry>

</variablelist>

</refsect1>

<refsect1><title>WARNINGS</title>

<itemizedlist>

<listitem><para>

Some nodes (Cisco) use non-standard timestamps, which is allowed by RFC, but makes timestamps mostly useless.

</para></listitem>

<listitem><para>
Some nodes generate messed timestamps (Solaris>2.4), when
run <command/xntpd/. Seems, its IP stack uses
a corrupted clock source,
which is synchronized to time-of-day clock periodically and jumps
randomly making timestamps mostly useless. Good news is that you can
use NTP in this case, which is even better.

</para></listitem>

<listitem><para>
<command/clockdiff/ shows difference in time modulo 24 days.

</para></listitem>

</itemizedlist>

</refsect1>

<refsect1><title>SEE ALSO</title>

<para>

<link linkend="ping">

<citerefentry><refentrytitle/ping/<manvolnum/8/</citerefentry></link>,&br/><link linkend="arping">

<citerefentry><refentrytitle/arping/<manvolnum/8/</citerefentry></link>,&br/><link linkend="tracepath">

<citerefentry><refentrytitle/tracepath/<manvolnum/8/</citerefentry></link>.

</para>

</refsect1>

<refsect1><title>REFERENCES</title>

<para>

[1] <anchor id="clockdiff.icmp-echo">ICMP ECHO,

<ulink url="ftp://ftp.isi.edu/in-notes/rfc792.txt">

RFC0792, page 14</ulink>.

</para>

<para>

[2] <anchor id="clockdiff.icmp-timestamp">ICMP TIMESTAMP,

<ulink url="ftp://ftp.isi.edu/in-notes/rfc792.txt">

RFC0792,

page 16</ulink>.

</para>

<para>

[3] <anchor id="clockdiff.ip-timestamp">IP TIMESTAMP option,

<ulink url="ftp://ftp.isi.edu/in-notes/rfc791.txt">

RFC0791, 3.1, page 16</ulink>.

</para>

</refsect1>

<refsect1><title>AUTHOR</title>

<para>

<command/clockdiff/ was compiled by

<ulink url="mailto:kuznet@ms2.inr.ac.ru">Alexey Kuznetsov
<kuznet@ms2.inr.ac.ru></ulink>. It was based on code borrowed
from BSD <command/timed/ daemon.
It is now maintained by
<ulink url="mailto:yoshfuji@skbuff.net">YOSHIFUJI Hideaki
<yoshfuji@skbuff.net></ulink>.
</para>
</refsect1>

<refsect1><title>SECURITY</title>
<para>
<command/clockdiff/ requires <constant/CAP_NET_RAWIO/ capability
to be executed. It is safe to be used as set-uid root.
</para>
</refsect1>

<refsect1><title>AVAILABILITY</title>
<para>
<command/clockdiff/ is part of <filename/iputils/ package
and the latest versions are available in source form at
<ulink url="http://www.skbuff.net/iputils/iputils-current.tar.bz2">
http://www.skbuff.net/iputils/iputils-current.tar.bz2</ulink>.
</para>
</refsect1>

<![IGNORE[
<refsect1><title>COPYING</title>
<para>
<literallayout>
This
documentation is free software; you can redistribute
it and/or modify it under the terms of the GNU General Public
License Version 2.

This program is distributed in the hope that it will be
useful, but WITHOUT ANY WARRANTY; without even the implied
warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.
See the GNU General Public License for more details.

For more details see the file COPYING in the source
distribution of Linux kernel of version 2.4.
</literallayout>
</para>
</refsect1>
]]>

</refentry>

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/clockdiff.sgml

No license file was found, but licenses were detected in source scan.

<refentry id="rarpd">

<refmeta>

<refentrytitle>rarpd</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

<refnamediv>

<refname>rarpd</refname>

<refpurpose>answer RARP REQUESTs</refpurpose>

</refnamediv>

<refsynopsisdiv>

<cmdsynopsis>

<command>arping</command>

<arg choice="opt"><option>-aAvde</option></arg>

<arg choice="opt">-b <replaceable/bootdir/</arg>

<arg choice="opt"><replaceable/interface/</arg>

</cmdsynopsis>

</refsynopsisdiv>

<refsect1><title>DESCRIPTION</title>

<para>

Listens

<ulink url="ftp://ftp.isi.edu/in-notes/rfc903.txt">RARP</ulink>

requests from clients. Provided MAC address of client

is found in <filename>/etc/ethers</filename> database and

obtained host name is resolvable to an IP address appropriate

for attached network, <command/rarpd/ answers to client with RARPD

reply carrying an IP address.

</para>

<para>

To allow multiple boot servers on the network

<command/rarpd/

optionally checks for presence Sun-like bootable image in TFTP directory.

It should have form <userinput/Hexadecimal_IP.ARCH/, f.e. to load

sparc 193.233.7.98 <filename/C1E90762.SUN4M/ is linked to

an image appropriate for SUM4M in directory <filename>/etc/tftpboot</filename>.

</para>

</refsect1>

<refsect1><title>WARNING</title>

<para>

This facility is deeply obsoleted by

<ulink url="ftp://ftp.isi.edu/in-notes/rfc951.txt">BOOTP</ulink>

and later

<ulink url="ftp://ftp.isi.edu/in-notes/rfc2131.txt">DHCP</ulink> protocols.

However, some clients really still need this to boot.

</para>

</refsect1>

<refsect1><title>OPTIONS</title>

<variablelist>

<varlistentry>

<term><option>-a</term>

<listitem><para>

Listen on all the interfaces. Currently it is an internal option, its function is overridden with <replaceable>/interface/</replaceable> argument. It should not be used.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-A</term>

<listitem><para>

Listen

not only RARP but also ARP messages, some rare clients use ARP by some unknown reason.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-v</term>

<listitem><para>

Be verbose.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-d</term>

<listitem><para>

Debug mode. Do not go to background.

</para></listitem>

</varlistentry>

<varlistentry>
<term><option>-e</term>
<listitem><para>
Do not check for presence of a boot image, reply if MAC address
resolves to a valid IP address using <filename>/etc/ethers</filename>
database and DNS.
</para></listitem>
</varlistentry>

<varlistentry>
<term><option>-b <replaceable>bootdir</option></term>
<listitem><para>
TFTP boot directory. Default is <filename>/etc/tftpboot</filename>
</para></listitem>
</varlistentry>
</variablelist>
</refsect1>

<refsect1><title>SEE ALSO</title>
<para>
<link linkend="arping">
<citerefentry><refentrytitle>arping/<manvolnum>8/</citerefentry></link>,
<link
linkend="tftpd">
<citerefentry><refentrytitle>tftpd/<manvolnum>8/</citerefentry></link>.
</para>
</refsect1>

<refsect1><title>AUTHOR</title>
<para>
<command>rarpd/ was written by
<ulink url="mailto:kuznet@ms2.inr.ac.ru">Alexey Kuznetsov
<kuznet@ms2.inr.ac.ru></ulink>.
It is now maintained by
<ulink url="mailto:yoshfuji@skbuff.net">YOSHIFUJI Hideaki
<yoshfuji@skbuff.net></ulink>.
</para>
</refsect1>

<refsect1><title>SECURITY</title>
<para>
<command>rarpd/ requires <constant>CAP_NET_RAWIO/ capability
to listen and send RARP and ARP packets. It also needs <constant>CAP_NET_ADMIN/
to give to kernel hint for ARP resolution; this is not strictly required,
but some (most of, to be more exact) clients are so badly broken that
are not able to answer ARP before they are finally booted. This is
not wonderful taking into account that clients using RARPD in 2002
are all unsupported relic creatures of 90's and even earlier.

</para>
</refsect1>

<refsect1><title>AVAILABILITY</title>

<para>

<command/rarpd/

is part of <filename/iputils/ package

and the latest versions are available in source form at

<ulink url="http://www.skbuff.net/iputils/iputils-current.tar.bz2">

http://www.skbuff.net/iputils/iputils-current.tar.bz2</ulink>.

</para>

</refsect1>

<![IGNORE[

<refsect1><title>COPYING</title>

<para>

<literallayout>

This documentation is free software; you can redistribute

it and/or modify it under the terms of the GNU General Public

License Version 2.

This program is distributed in the hope that it will be

useful, but WITHOUT ANY WARRANTY; without even the implied

warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

See the GNU General Public License for more details.

For more details see the file COPYING in the source

distribution of Linux kernel of version 2.4.

</literallayout>

</para>

</refsect1>

]]>

</refentry>

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/rarpd.sgml

No license file was found, but licenses were detected in source scan.

/*

* arping.c

*

* This program is free software; you can redistribute it and/or

* modify it under the terms of the GNU General Public License

* as published by the Free Software Foundation; either version
* 2 of the License, or (at your option) any later version.
*
* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>
*/

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/arping.c
No license file was found, but licenses were detected in source scan.

<refentry id="tracepath">

<refmeta>

<refentrytitle>tracepath</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

<refnamediv>

<refname>tracepath, tracepath6</refname>

<refpurpose>

traces path to a network host discovering MTU along this path</refpurpose>

</refnamediv>

<refsynopsisdiv>

<cmdsynopsis>

<command>tracepath</command>

<arg choice="opt">-n</arg>

<arg choice="opt">-l <replaceable/pktlen/</arg>

<arg choice="req"><replaceable/destination/</arg>

<arg choice="opt"><replaceable/port/</arg>

</cmdsynopsis>

</refsynopsisdiv>

<refsect1><title>DESCRIPTION</title>

<para>

It traces path to <replaceable/destination/ discovering MTU along this path.

It uses UDP port <replaceable/port/ or some random port.

It is similar to <command/traceroute/, only does not not require superuser privileges and has no fancy options.

</para>

<para>

<command/tracepath6/ is good replacement for

<command/traceroute6/

and classic example of application of Linux error queues.

The situation with <command/tracepath/ is worse, because commercial

IP routers do not return enough information in icmp error messages.
Probably, it will change, when they will be updated.
For now it uses Van Jacobson's trick, sweeping a range
of UDP ports to maintain trace history.

</para>

</refsect1>

<refsect1><title>OPTIONS</title>

<variablelist>

<varlistentry>

<term><option/-n/</term>

<listitem><para>

Do not look up host names. Only print IP addresses numerically.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option/-l/</term>

<listitem><para>

Sets the initial packet length to <replaceable/pktlen/ instead of
65536 for <command/tracepath/ or 128000 for <command/tracepath6/.

</para></listitem>

</varlistentry>

</variablelist>

</refsect1>

<refsect1><title>OUTPUT</title>

<para>

<literallayout>

```
root@mops:~ # tracepath6 3ffe:2400:0:109::2
```

```
1?: [LOCALHOST]
```

```
    pmtu 1500
```

```
1: dust.inr.ac.ru          0.411ms
```

```
2: dust.inr.ac.ru    asymm 1  0.390ms pmtu 1480
```

```
2: 3ffe:2400:0:109::2      463.514ms reached
```

```
    Resume: pmtu 1480 hops 2 back 2
```

</literallayout>

</para>

<para>

The first column shows <literal/TTL/ of the probe, followed by colon.

Usually value of <literal/TTL/ is obtained from reply from network,

but sometimes reply does not contain necessary information and

we have to guess it. In this case the number is followed by ?.

</para>

<para>

The second column shows the network hop, which replied to the probe. It is either address of router or word `<literal/[LOCALHOST]/>`, if the probe was not sent to the network.

The rest of line shows miscellaneous information about path to the corresponding network hop. As rule it contains value of RTT. Additionally, it can show Path MTU, when it changes. If the path is asymmetric or the probe finishes before it reach prescribed hop, difference between number of hops in forward and backward direction is shown following keyword `<literal/async/>`. This information is not reliable. F.e. the third line shows asymmetry of 1, it is because the first probe with TTL of 2 was rejected at the first hop due to Path MTU Discovery.

The last line summarizes information about all the path to the destination, it shows detected Path MTU, amount of hops to the destination and our guess about amount of hops from the destination to us, which can be different when the path is asymmetric.

SEE ALSO

`<citerefentry><refentrytitle/traceroute/<manvolnum/8/</citerefentry>`, `<link linkend="traceroute6">`
`<citerefentry><refentrytitle/traceroute6/<manvolnum/8/</citerefentry></link>`, `<link linkend="ping">`
`<citerefentry><refentrytitle/ping/<manvolnum/8/</citerefentry></link>`.

AUTHOR

`<command/tracepath/` was written by `<ulink url="mailto:kuznet@ms2.inr.ac.ru">Alexey Kuznetsov <kuznet@ms2.inr.ac.ru></ulink>`.

<refsect1><title>SECURITY</title>

<para>

No security issues.

</para>

<para>

This lapidary deserves to be elaborated.

<command/tracepath/ is not a privileged program, unlike

<command/traceroute/, <command/ping/ and other beasts of this kind.

<command/tracepath/ may be executed by everyone who has some access to network, enough to send UDP datagrams to investigated destination using given port.

</para>

</refsect1>

<refsect1><title>AVAILABILITY</title>

<para>

<command/tracepath/ is part of <filename/iputils/ package

and the latest versions are available in source form at

<ulink url="http://www.skbuff.net/iputils/iputils-current.tar.bz2">

http://www.skbuff.net/iputils/iputils-current.tar.bz2</ulink>.

</para>

</refsect1>

<![IGNORE[

<refsect1><title>COPYING</title>

<para>

<literallayout>

This documentation is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License
Version 2.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

For more details see the file COPYING in the source distribution of Linux kernel of version 2.4.

</literallayout>

</para>

</refsect1>

]]>

</refentry>

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/tracepath.shtml
No license file was found, but licenses were detected in source scan.

License: BSD

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/iputils.spec
No license file was found, but licenses were detected in source scan.

/*

* rarpd.c RARP daemon.

*

* This program is free software; you can redistribute it and/or
* modify it under the terms of the GNU General Public License
* as published by the Free Software Foundation; either version
* 2 of the License, or (at your option) any later version.

*

* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>

*/

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/rarpd.c
No license file was found, but licenses were detected in source scan.

<refentry id="ping">

<refmeta>

<refentrytitle>ping</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

<refnamediv>

<refname>ping, ping6</refname>

<refpurpose>send ICMP ECHO_REQUEST to network hosts</refpurpose>

</refnamediv>

<refsynopsisdiv>

<cmdsynopsis>

<command>ping</command>

<arg choice="opt"><option>-LRUbdnqrVvaAB</option></arg>

<arg choice="opt">-c <replaceable/count/</arg>

```

<arg choice="opt">-i <replaceable/interval/</arg>
<arg choice="opt">-l <replaceable/preload/</arg>
<arg choice="opt">-p <replaceable/pattern/</arg>
<arg choice="opt">-s <replaceable/packetsize/</arg>
<arg choice="opt">-t <replaceable/ttl/</arg>
<arg choice="opt">-w <replaceable/deadline/</arg>
<arg choice="opt">-F <replaceable/flowlabel/</arg>
<arg choice="opt">-I <replaceable/interface/</arg>
<arg choice="opt">-M <replaceable/hint/</arg>
<arg choice="opt">-Q <replaceable/tos/</arg>
<arg choice="opt">-S
  <replaceable/sndbuf/</arg>
<arg choice="opt">-T <replaceable/timestamp option/</arg>
<arg choice="opt">-W <replaceable/timeout/</arg>
<arg choice="opt" rep="repeat"><replaceable/hop/</arg>
<arg choice="req"><replaceable/destination/</arg>
</cmdsynopsis>
</refsynopsisdiv>

```

<refsect1><title>DESCRIPTION</title>

<para>

<command/ping/ uses the ICMP protocol's mandatory ECHO_REQUEST datagram to elicit an ICMP ECHO_RESPONSE from a host or gateway. ECHO_REQUEST datagrams ("pings") have an IP and ICMP header, followed by a <structname/struct timeval/ and then an arbitrary number of "pad" bytes used to fill out the packet.

</para>

</refsect1>

<refsect1><title>OPTIONS</title>

<variablelist>

<varlistentry>

<term><option/-a/</term>

<listitem><para>

Audible ping.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option/-A/</term>

<listitem><para>

Adaptive ping. Interpacket interval adapts to round-trip time, so that effectively not more than one (or more, if preload

is set) unanswered probes

present in the network. Minimal interval is 200msec for not super-user.

On networks with low rtt this mode is essentially equivalent to flood mode.

</para></listitem>

</varlistentry>

<varlistentry>
 <term><option/-b/</term>
 <listitem><para>
 Allow pingging a broadcast address.
 </para></listitem>
 </varlistentry>
 <varlistentry>
 <term><option/-B/</term>
 <listitem><para>
 Do not allow <command/ping/ to change source address of probes.
 The address is bound to one selected when <command/ping/ starts.
 </para></listitem>
 </varlistentry>
 <varlistentry>
 <term><option><anchor id="ping.count">-c <replaceable/count/</option></term>
 <listitem><para>
 Stop after sending <replaceable/count/ ECHO_REQUEST
 packets. With
 <link linkend="ping.deadline"><replaceable/deadline/</link>
 option, <command/ping/ waits for
 <replaceable/count/ ECHO_REPLY packets, until the timeout expires.
 </para></listitem>
 </varlistentry>
 <varlistentry>
 <term><option/-d/</term>
 <listitem><para>
 Set the <constant/SO_DEBUG/ option on the socket being used.
 Essentially, this socket option is not used by Linux kernel.
 </para></listitem>
 </varlistentry>
 <varlistentry>
 <term><option>-F <replaceable/flow label/</option></term>
 <listitem><para>
 Allocate and set 20 bit flow label on echo request packets.
 (Only <command/ping6/). If value is zero, kernel allocates random flow label.
 </para></listitem>
 </varlistentry>
 <varlistentry>
 <term><option/-f/</term>
 <listitem><para>
 Flood ping. For every ECHO_REQUEST sent a period ``." is printed,
 while for ever ECHO_REPLY received a backspace is printed.
 This provides a rapid display of how many packets are being dropped.
 If interval is not given, it sets interval to zero and
 outputs packets as fast as they come back or one hundred times per second,
 whichever is more.
 Only the super-user may use this option with zero interval.
 </para></listitem>

</varlistentry>

<varlistentry>

<term><option>-i <replaceable/interval/</option></term>

<listitem><para>

Wait <replaceable/interval/ seconds between sending each packet. The default is to wait for one second between each packet normally, or not to wait in flood mode. Only super-user may set interval to values less 0.2 seconds.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-I <replaceable/interface address/</option></term>

<listitem><para>

Set source address to specified interface address. Argument may be numeric IP address or name of device. When pinging IPv6 link-local address this option is required.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-l <replaceable/preload/</option></term>

<listitem><para>

If <replaceable/preload/ is specified, <command/ping/ sends that many packets not waiting for reply. Only the super-user may select preload more than 3.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-L</term>

<listitem><para>

Suppress loopback of multicast packets.

This flag only applies if the ping destination is a multicast address.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-n</term>

<listitem><para>

Numeric output only.

No attempt will be made to lookup symbolic names for host addresses.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-p <replaceable/pattern/</option></term>

<listitem><para>

You may specify up to 16 ``pad" bytes to fill out the packet you send.

This is useful for diagnosing data-dependent problems in a network.

For example, <option>-p ff</option> will cause the sent packet to be filled with all ones.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-Q <replaceable/tos/</option></term>

<listitem><para>

Set Quality of Service -related bits in ICMP datagrams.

<replaceable/tos/ can be either decimal or hex number.

Traditionally (RFC1349), these have been interpreted as: 0 for reserved (currently being redefined as congestion control), 1-4 for

Type of Service

and 5-7 for Precedence.

Possible settings for Type of Service are: minimal cost: 0x02,

reliability: 0x04, throughput: 0x08, low delay: 0x10. Multiple TOS bits should not be set simultaneously. Possible settings for

special Precedence range from priority (0x20) to net control (0xe0). You must be root (<constant/CAP_NET_ADMIN/ capability) to use Critical or higher precedence value. You cannot set

bit 0x01 (reserved) unless ECN has been enabled in the kernel.

In RFC2474, these fields has been redefined as 8-bit Differentiated

Services (DS), consisting of: bits 0-1 of separate data (ECN will be used, here), and bits 2-7 of Differentiated Services Codepoint (DSCP).

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-q</term>

<listitem><para>

Quiet output.

Nothing is displayed except the summary lines at startup time and when finished.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-R</term>

<listitem><para>

Record route.

Includes

the RECORD_ROUTE option in the ECHO_REQUEST packet and displays the route buffer on returned packets.

Note that the IP header is only large enough for nine such routes.

Many hosts ignore or discard this option.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>-r</term>

<listitem><para>

Bypass the normal routing tables and send directly to a host on an attached interface.

If the host is not on a directly-attached network, an error is returned.

This option can be used to ping a local host through an interface that has no route through it provided the option `<option>-I/` is also used.

`</para></listitem>`

`</varlistentry>`

`<varlistentry>`

`<term><option>-s <replaceable/packetsize/</option></term>`

`<listitem><para>`

Specifies the number of data bytes to be sent.

The default is 56, which translates into 64 ICMP

data bytes when combined with the 8 bytes of ICMP header data.

`</para></listitem>`

`</varlistentry>`

`<varlistentry>`

`<term><option>-S <replaceable/sndbuf/</option></term>`

`<listitem><para>`

Set socket sndbuf. If not specified, it is selected to buffer not more than one packet.

`</para></listitem>`

`</varlistentry>`

`<varlistentry>`

`<term><option>-t <replaceable/ttl/</option></term>`

`<listitem><para>`

Set the IP Time to Live.

`</para></listitem>`

`</varlistentry>`

`<varlistentry>`

`<term><option>-T <replaceable/timestamp option/</option></term>`

`<listitem><para>`

Set special IP timestamp options.

`<replaceable/timestamp option/` may be either

`<replaceable/tsonly/` (only timestamps),

`<replaceable/tsandaddr/` (timestamps and addresses) or

`<replaceable/tsprespec host1 [host2 [host3 [host4]]]/`

(timestamp prespecified hops).

`</para></listitem>`

`</varlistentry>`

`<varlistentry>`

`<term><option>-M <replaceable/hint/</option></term>`

`<listitem><para>`

Select Path MTU Discovery strategy.

`<replaceable/hint/` may be either `<replaceable/do/`

(prohibit fragmentation, even local one),

`<replaceable/want/` (do PMTU discovery, fragment locally when packet size

is large), or `<replaceable/dont/` (do not set DF flag).

`</para></listitem>`

`</varlistentry>`

```

<varlistentry>
  <term><option>-U</term>
  <listitem><para>
Print full user-to-user latency (the old behaviour). Normally
<command>ping/
prints network round trip time, which can be different
f.e. due to DNS failures.
  </para></listitem>
</varlistentry>
<varlistentry>
  <term><option>-v</term>
  <listitem><para>
Verbose output.
  </para></listitem>
</varlistentry>
<varlistentry>
  <term><option>-V</term>
  <listitem><para>
Show version and exit.
  </para></listitem>
</varlistentry>
<varlistentry>
  <term><option><anchor id="ping.deadline">-w <replaceable>/deadline/</option></term>
  <listitem><para>
Specify a timeout, in seconds, before
<command>ping/
exits regardless of how many
packets have been sent or received. In this case
<command>ping/
does not stop after
<link linkend="ping.count"><replaceable>/count/</link>
packet are sent, it waits either for
<link linkend="ping.deadline"><replaceable>/deadline/</link>
expire
or until
<link linkend="ping.count"><replaceable>/count/</link>
probes are answered or for some error notification from network.
  </para></listitem>
</varlistentry>
<varlistentry>
  <term><option>-W <replaceable>/timeout/</option></term>
  <listitem><para>
Time to wait for a response, in seconds. The option affects only timeout
in absense of any responses, otherwise <command>ping/ waits for two RTTs.
  </para></listitem>
</varlistentry>
</variablelist>

```

<para>

When using <command/ping/ for fault isolation, it should first be run on the local host, to verify that the local network interface is up and running. Then, hosts and gateways further and further away should be ``pinged''. Round-trip times and packet loss statistics are computed. If duplicate packets are received, they are not included in the packet loss calculation, although the round trip time of these packets is used in calculating the minimum/average/maximum round-trip time numbers.

When the specified number of packets have been sent (and received) or if the program is terminated with a <constant/SIGINT/, a brief summary is displayed. Shorter current statistics can be obtained without termination of process with signal <constant/SIGQUIT/.

</para>

<para>

If <command/ping/ does not receive any reply packets at all it will exit with code 1. If a packet

<link linkend="ping.count"><replaceable/count/</link>

and

<link linkend="ping.deadline"><replaceable/deadline/</link>

are both specified, and fewer than

<link linkend="ping.count"><replaceable/count/</link>

packets are received by the time the

<link linkend="ping.deadline"><replaceable/deadline/</link>

has arrived, it will also exit with code 1.

On other error it exits with code 2. Otherwise it exits with code 0. This makes it possible to use the exit code to see if a host is alive or not.

</para>

<para>

This program is intended for use in network testing, measurement and management.

Because of the load it

can impose on the network, it is unwise to use

<command/ping/ during normal operations or from automated scripts.

</para>

</refsect1>

<refsect1><title>ICMP PACKET DETAILS</title>

<para>

An IP header without options is 20 bytes.

An ICMP ECHO_REQUEST packet contains an additional 8 bytes worth of ICMP header followed by an arbitrary amount of data.

When a <replaceable/packagesize/ is given, this indicated the size of this extra piece of data (the default is 56). Thus the amount of data received inside of an IP packet of type ICMP ECHO_REPLY will always be 8 bytes more than the requested data space (the ICMP header).

</para>

<para>

If the data space is at least of size of <structname/struct timeval/ <command/ping/ uses the beginning bytes of this space to include a timestamp which it uses in the computation of round trip times.

If the data space is shorter, no round trip times are given.

</para>

</refsect1>

<refsect1><title>DUPLICATE AND DAMAGED PACKETS</title>

<para>

<command/ping/

will report duplicate and damaged packets.

Duplicate packets should never occur, and seem to be caused by inappropriate link-level retransmissions.

Duplicates may occur in many situations and are rarely (if ever) a good sign, although the presence of low levels of duplicates may not always be cause for alarm.

</para>

<para>

Damaged packets are obviously serious cause for alarm and often indicate broken hardware somewhere in the <command/ping/ packet's path (in the network or in the hosts).

</para>

</refsect1>

<refsect1><title>TRYING DIFFERENT DATA PATTERNS</title>

<para>

The (inter)network layer should never treat packets differently depending on the data contained in the data portion.

Unfortunately, data-dependent problems have been known to sneak into networks and remain undetected for long periods of time.

In many cases the particular pattern that will have problems is something that doesn't have sufficient ``transitions'', such as all ones or all zeros, or a pattern right at

the edge, such as almost all zeros.

It isn't necessarily enough to specify a data pattern of all zeros (for example) on the command line because the pattern that is of interest is at the data link level, and the relationship between what you type and what the controllers transmit can be complicated.

</para>

<para>

This means that if you have a data-dependent problem you will probably have to do a lot of testing to find it.

If you are lucky, you may manage to find a file that either can't be sent across your network or that takes much longer to transfer than other similar length files.

You can then examine this file for repeated patterns that you can test using the <option>-p</option> option of <command>ping</command>.

</para>

</refsect1>

<refsect1><title>TTL DETAILS</title>

<para>

The TTL value of an IP packet represents the maximum number of IP routers that the packet can go through before being thrown away.

In current practice you can expect each router in the Internet to decrement the TTL field

by exactly one.

</para>

<para>

The TCP/IP specification states that the TTL field for TCP packets should be set to 60, but many systems use smaller values (4.3 BSD uses 30, 4.2 used 15).

</para>

<para>

The maximum possible value of this field is 255, and most Unix systems set the TTL field of ICMP ECHO_REQUEST packets to 255.

This is why you will find you can ``ping" some hosts, but not reach them with

<citerefentry><refentrytitle>telnet</refentrytitle><manvolnum>1</manvolnum></citerefentry>

or

<citerefentry><refentrytitle>ftp</refentrytitle><manvolnum>1</manvolnum></citerefentry>.

</para>

<para>

In normal operation ping prints the ttl value from the packet it receives.

When a remote system receives a ping packet, it can do one of three things

with the TTL field in its response:

</para>

<itemizedlist>

<listitem><para>

Not change it; this is what Berkeley Unix systems did before the 4.3BSD Tahoe release. In this case the TTL value in the received packet will be 255 minus the number of routers in the round-trip path.

</para></listitem>

<listitem><para>

Set it to 255; this is what current Berkeley Unix systems do.

In this case the TTL value in the received packet will be 255 minus the number of routers in the path *from* the remote system *to* the `ping` host.

</para></listitem>

<listitem><para>

Set it to some other value. Some machines use the same value for ICMP packets that they use for TCP packets, for example either 30 or 60. Others may use completely wild values.

</para></listitem>

</itemizedlist>

</refsect1>

<refsect1><title>BUGS</title>

<itemizedlist>

<listitem><para>

Many Hosts and Gateways ignore the RECORD_ROUTE option.

</para></listitem>

<listitem><para>

The maximum IP header length is too small for options like RECORD_ROUTE to be completely useful.

There's not much that that can be done about this, however.

</para></listitem>

<listitem><para>

Flood pinging is not recommended in general, and flood pinging the broadcast address should only be done under very controlled conditions.

</para></listitem>

</itemizedlist>

</refsect1>

<refsect1><title>SEE ALSO</title>

<para>

<citerefentry><refentrytitle>netstat</manvolnum/1/</citerefentry>,</citerefentry><refentrytitle>ifconfig</manvolnum/8/</citerefentry>.

</para>
</refsect1>

<refsect1><title>HISTORY</title>

<para>
The <command/ping/ command appeared in 4.3BSD.

</para>

<para>
The version described here is its descendant specific to Linux.

</para>
</refsect1>

<refsect1><title>SECURITY</title>

<para>
<command/ping/ requires <constant/CAP_NET_RAWIO/ capability to be executed. It may be used as set-uid root.

</para>
</refsect1>

<refsect1><title>AVAILABILITY</title>

<para>
<command/ping/ is part of <filename/iputils/ package and the latest versions are available in source form at
<ulink url="http://www.skbuff.net/iputils/iputils-current.tar.bz2">
<http://www.skbuff.net/iputils/iputils-current.tar.bz2></ulink>.

</para>
</refsect1>

<![IGNORE[

<refsect1><title>COPYING</title>

<para>
<literallayout>

Copyright
(c) 1989 The Regents of the University of California.
All rights reserved.

This code is derived from software contributed to Berkeley by
Mike Muuss.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software

must display the following acknowledgement:

This product includes software developed by the University of California, Berkeley and its contributors.

4. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS'' AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

</literallayout>

</para>

</refsect1>

]]>

</refentry>

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/ping.sgml

No license file was found, but licenses were detected in source scan.

=head1 NAME

docbook2man-spec - convert DocBook RefEntries to Unix manpages

=head1 SYNOPSIS

The SGMLSpM package from CPAN. This contains the sgmlspl script which is used to grok this file. Use it like this:

```
nsgmls some-docbook-document.sgml | sgmlspl docbook2man-spec.pl
```

=head1 DESCRIPTION

This is a sgmlspl spec file that produces Unix-style manpages from RefEntry markup.

See the accompanying RefEntry man page for 'plain new' documentation. :)

=head1 LIMITATIONS

Trying docbook2man on non-DocBook or non-conformant SGML results in undefined behavior. :-)

This program is a slow, dodgy Perl script.

This program does not come close to supporting all the possible markup in DocBook, and will produce wrong output in some cases with supported markup.

=head1 TODO

Add new element handling and fix existing handling. Be robust.

Produce cleanest, readable man output as possible (unlike some other converters). Follow

Linux man(7) convention.

If this results in added logic in this script, that's okay. The code should still be reasonably organized.

Make it faster. If Perl sucks port it to another language.

=head1 COPYRIGHT

Copyright (C) 1998-1999 Steve Cheng <steve@ggi-project.org>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version.

You should have received a copy of the GNU General Public License along with this program; see the file COPYING. If not, please write to the Free Software Foundation, 675 Mass Ave, Cambridge, MA 02139, USA.

=cut

\$Id: docbook2man-spec.pl,v 1.1 2000/07/21 20:22:30 rosalia Exp \$

use SGMLS; # Use the SGMLS package.
use SGMLS::Output; # Use stack-based output.
use SGMLS::Refs;

SGMLSPL script produced automatically by

```

the script sgmlspl.pl
#
# Document Type: any, but processes only RefEntries
# Edited by: me :)
#####

$write_manpages = 0;
$blank_xrefs = 0;

sgml('start', sub {
  push_output('nul');
  $raw_cdata = 1; # Makes it a bit faster.

# Links file
open(LINKSFILE, ">manpage.links");

$Refs = new SGMLS::Refs("manpage.refs");
});
sgml('end', sub {
  close(LINKSFILE);
  if($blank_xrefs) {
    print STDERR "Warning: output contains unresolved XRefs\n";
  }
});

#####
#
# Output helpers
#
#####

# Our own version of sgml() and output() to allow simple string output
# to play well with roff's stupid whitespace rules.

sub man_sgml
{
  if(ref($_[1]) eq 'CODE') {
    return &sgml;
  }

  my $s = $_[1];

  $s =~ s/\\|\\\|\\g;
  $s =~ s/'|\"|'g;

```

```

# \n at the beginning means start at beginning of line
if($s
=~ s/^\n/) {
  $sub = 'sub { output "\n" unless $newline_last++; ';
  if($s eq ") {
    sgml($_[0], eval('sub { output "\n" unless $newline_last++; }'));
  } elsif($s =~ \n$/) {
    sgml($_[0], eval("sub { output '\\\n\' unless \ $newline_last++; output '$s'; }"));
  } else {
    sgml($_[0], eval("sub { output '\\\n\' unless \ $newline_last; output '$s'; \ $newline_last = 0; }"));
  }
} else {
  if($s =~ \n$/) {
    sgml($_[0], eval("sub { output '$s'; \ $newline_last = 1; }"));
  } else {
    sgml($_[0], eval("sub { output '$s'; \ $newline_last = 0; }"));
  }
}
}

```

```
sub man_output
```

```

{
  $_ = shift;
  if(s/^\n/) {
    output "\n" unless $newline_last++;
  }
  return if $_ eq ";

```

```
output $_;
```

```

if(@_) {
  output @_;
  $newline_last = (pop(@_) =~ \n$/);
} else {
  $newline_last = ($_ =~ \n$/);
}
}

```

```
# Fold lines into one, quote some characters
```

```
sub fold_string
```

```

{
  $_ = shift;

  s/\\|\\\|/g;
  s/'^|&' /g;

```

```
# Change tabs to spaces
```

```
tr/t/n/ /;
```

```

# Trim whitespace from beginning and end.
s/^ +//;
s/
+$/;

return $_;
}

sub save_cdata()
{
$raw_cdata++;
push_output('string');
}

sub bold_on()
{
# If the last font is also bold, don't change anything.
# Basically this is to just get more readable man output.
if($fontstack[$#fontstack] ne 'bold') {
if(!$raw_cdata) {
output '\fB';
$newline_last = 0;
}
}
push(@fontstack, 'bold');
}

sub italic_on()
{
# If the last font is also italic, don't change anything.
if($fontstack[$#fontstack] ne 'italic') {
if(!$raw_cdata) {
output '\fI';
$newline_last = 0;
}
}
push(@fontstack, 'italic');
}

sub font_off()
{
my $thisfont = pop(@fontstack);
my $lastfont = $fontstack[$#fontstack];

# Only output font change if it is different
if($thisfont ne $lastfont) {
if($raw_cdata) { return; }
}
}

```

```
elseif($lastfont eq 'bold') { output '\fB'; }
elseif($lastfont eq 'italic') { output '\fI'; }
else { output '\fR'; }
```

```
$newline_last = 0;
}
}
```

```
#####
#
#
Manpage management
#
#####
```

```
sgml('<REFENTRY>', sub {
# This will be overwritten at end of REFMETA, when we know the name of the page.
pop_output();
```

```
$write_manpages = 1; # Currently writing manpage.
```

```
$nocollapse_whitespace = 0; # Current whitespace collapse counter.
```

```
$newline_last = 1; # At beginning of line?
```

```
# Just a bit of warning, you will see this variable manipulated
# manually a lot. It makes the code harder to follow but it
# saves you from having to worry about collapsing at the end of
# parse, stopping at verbatims, etc.
```

```
$raw_cdata = 0; # Instructs certain output functions to
# leave CDATA alone, so we can assign
# it to a string and process it, etc.
```

```
@fontstack = (); # Fonts being activated.
```

```
$manpage_title = ""; # Needed for indexing.
```

```
$manpage_sect = "";
```

```
@manpage_names = ();
```

```
$manpage_misc = "";
```

```
$list_nestlevel = 0; # Indent certain nested
content.
```

```
});
sgml('</REFENTRY>', sub {
if(!$newline_last) {
```

```

output "\n";
}

$write_manpages = 0;
$raw_cdata = 1;
push_output('nul');
});

sgml('</REFMETA>', sub {
push_output('file', "$manpage_title.$manpage_sect");

output <<_END_BANNER;
.\|" This manpage has been automatically generated by docbook2man
.\|" from a DocBook document. This tool can be found at:
.\|" <http://shell.ipoline.com/~elmert/comp/docbook2X/>
.\|" Please send any bug reports, improvements, comments, patches,
.\|" etc. to Steve Cheng <steve\@ggi-project.org>.
_END_BANNER

my $manpage_date = `date "+%d %B %Y"`;

output '.TH "'';

# If the title is not mixed-case, convention says to
# uppercase the whole title. (The canonical title is
# lowercase.)
if($manpage_title =~ /[A-Z]/) {
output fold_string($manpage_title);
} else {
output uc(fold_string($manpage_title));
}

output "' '", fold_string($manpage_sect),
"' '", fold_string(`date "+%d %B %Y"`),
"' '", $manpage_misc,
"' '",
$manpage_manual,
"\n";

$newline_last = 1;

# References to this RefEntry.
my $id = $_[0]->parent->attribute('ID')->value;
if($id ne "") {
# The 'package name' part of the section should
# not be used when citing it.
my ($sectnum) = ($manpage_sect =~ /([0-9]*)/);

```

```

if($_[0]->parent->attribute('XREFLABEL')->value eq ") {
  $Refs->put("refentry:$id", "$manpage_title($sectnum)");
} else {
  $Refs->put("refentry:$id",
    $_[0]->parent->attribute('XREFLABEL')->value .
    "($sectnum)");
}
}
});

```

```

sgml('<REFENTRYTITLE>', sub {
  if($_[0]->in('REFMETA')) {
    save_cdata();
  } else {
    # Manpage citations are in bold.
    bold_on();
  }
});
sgml('</REFENTRYTITLE>', sub {
  if($_[0]->in('REFMETA')) {
    $raw_cdata--;
    $manpage_title = pop_output();
  }
  else { font_off(); }
});

```

```

sgml('<MANVOLNUM>', sub {
  if($_[0]->in('REFMETA')) {
    save_cdata();
  } else {
    # Manpage citations use ().
    output '(';
  }
});
sgml('</MANVOLNUM>', sub {
  if($_[0]->in('REFMETA')) {
    $raw_cdata--;
    $manpage_sect
    = pop_output();
  }
  else { output ')' }
});

```

```

sgml('<REFMISCINFO>', \&save_cdata);
sgml('</REFMISCINFO>', sub {
  $raw_cdata--;
  $manpage_misc = fold_string(pop_output());
});

```



```

# NAME section
man_sgml('<REFNAMEDIV>', "\n.SH NAME\n");

sgml('<REFNAME>', \&save_cdata);
sgml('</REFNAME>', sub {
    $raw_cdata--;
    push(@manpage_names, pop_output());
});

sgml('<REFPURPOSE>', \&save_cdata);
sgml('</REFPURPOSE>', sub {
    $raw_cdata--;
    my $manpage_purpose = fold_string(pop_output());

    for(my $i = 0; $i < $#manpage_names; $i++) {
        output fold_string($manpage_names[$i], ', ');
    }

    output fold_string($manpage_names[$#manpage_names]);
    output " \|- $manpage_purpose\n";

    $newline_last = 1;

    foreach(@manpage_names) {
        # Don't link to itself
        if($_ ne $manpage_title) {
            print LINKSFILE "$manpage_title.$manpage_sect $_.$manpage_sect\n";
        }
    }
});

man_sgml('<REFCLASS>', "\n.sp\n");

#RefDescriptor

#####
#
#
SYNOPSIS section and synopses
#
#####

```

```

man_sgml('<REFSYNOPSISDIV>', "\n.SH SYNOPSIS\n");
man_sgml('</REFSYNOPSISDIV>', "\n");

## FIXME! Must be made into block elements!!
#sgml('<FUNCSYNOPSIS>', \&bold_on);
#sgml('</FUNCSYNOPSIS>', \&font_off);
#sgml('<CMDSYNOPSIS>', \&bold_on);
#sgml('</CMDSYNOPSIS>', \&font_off);

man_sgml('<FUNCSYNOPSIS>', sub {
  man_output("\n.sp\n");
  bold_on();
});
man_sgml('</FUNCSYNOPSIS>', sub {
  font_off();
  man_output("\n");
});

man_sgml('<CMDSYNOPSIS>', "\n\n");
man_sgml('</CMDSYNOPSIS>', "\n\n");

man_sgml('<FUNCPROTOTYPE>', "\n.sp\n");

# Arguments to functions. This is C convention.
man_sgml('<PARAMDEF>', '(');
man_sgml('</PARAMDEF>', ');');
man_sgml('<VOID>', "(void);");

sub arg_start
{
  # my $choice = $_[0]->attribute('CHOICE')->value;

  # The content model for CmdSynopsis doesn't include #PCDATA,
  # so we won't see any of the whitespace in the source file,
  #
  # so we have to add it after each component.
  output ' ';

  if($_[0]->attribute('CHOICE')->value =~ /opt/i) {
    output '[';
  }
  bold_on();
}
sub arg_end
{
  font_off();
}

```

```

if($_[0]->attribute('REP')->value =~ /^Repeat/i) {
    italic_on();
    output ' ...';
    font_off();
}
if($_[0]->attribute('CHOICE')->value =~ /opt/i) {
    output ']';
}
}

sgml('<ARG>', \&arg_start);
sgml('</ARG>', \&arg_end);
sgml('<GROUP>', \&arg_start);
sgml('</GROUP>', \&arg_end);

sgml('<OPTION>', \&bold_on);
sgml('</OPTION>', \&font_off);

# FIXME: This is one _blank_ line.
man_sgml('<SBR>', "\n\n");

#####
#
# General sections
#
#####

# The name of the section is handled by TITLE. This just sets
# up the roff markup.
man_sgml('<REFSECT1>', "\n.SH ");
man_sgml('<REFSECT2>', "\n.SS ");
man_sgml('<REFSECT3>', "\n.SS ");

#####
#
#
Titles, metadata.
#
#####

sgml('<TITLE>', sub {
    if($_[0]->in('REFERENCE') or $_[0]->in('BOOK')) {
        $write_manpages = 1;
    }
    save_cdata();
});

```

```

sgml('</TITLE>', sub {
my $title = fold_string(pop_output());
$raw_cdata--;

if($_->in('REFERENCE') or $_->in('BOOK')) {
# We use TITLE of enclosing Reference or Book as manual name
$manpage_manual = $title;
$write_manpages = 0;
}
elsif(exists $_->parent->ext->{'title'}) {
# By far the easiest case. Just fold the string as
# above, and then set the parent element's variable.
$_->parent->ext->{'title'} = $title;
}
else {
# If the parent element's handlers are lazy,
# output the folded string for them :)
# We assume they want uppercase and a newline.
output "", uc($title), "\\n";
$newline_last = 1;
}
});

sgml('<ATTRIBUTION>', sub { push_output('string') });
sgml('</ATTRIBUTION>', sub { $_->parent->ext->{'attribution'}
= pop_output(); });

# IGNORE.
sgml('<DOCINFO>', sub { push_output('nul'); });
sgml('</DOCINFO>', sub { pop_output(); });
sgml('<REFSECT1INFO>', sub { push_output('nul'); });
sgml('</REFSECT1INFO>', sub { pop_output(); });
sgml('<REFSECT2INFO>', sub { push_output('nul'); });
sgml('</REFSECT2INFO>', sub { pop_output(); });
sgml('<REFSECT3INFO>', sub { push_output('nul'); });
sgml('</REFSECT3INFO>', sub { pop_output(); });

sgml('<INDEXTERM>', sub { push_output('nul'); });
sgml('</INDEXTERM>', sub { pop_output(); });

#####
#
# Set bold on enclosed content
#
#####

```

sgml('<APPLICATION>', \&bold_on); sgml('</APPLICATION>', \&font_off);

sgml('<CLASSNAME>', \&bold_on); sgml('</CLASSNAME>', \&font_off);
sgml('<STRUCTNAME>', \&bold_on); sgml('</STRUCTNAME>', \&font_off);
sgml('<STRUCTFIELD>', \&bold_on); sgml('</STRUCTFIELD>', \&font_off);
sgml('<SYMBOL>',
\&bold_on); sgml('</SYMBOL>', \&font_off);
sgml('<TYPE>', \&bold_on); sgml('</TYPE>', \&font_off);

sgml('<ENVAR>', \&bold_on); sgml('</ENVAR>', \&font_off);

sgml('<FUNCTION>', \&bold_on); sgml('</FUNCTION>', \&font_off);

sgml('<EMPHASIS>', \&bold_on); sgml('</EMPHASIS>', \&font_off);

sgml('<ERRORNAME>', \&bold_on); sgml('</ERRORNAME>', \&font_off);
ERRORTYPE

sgml('<COMMAND>', \&bold_on); sgml('</COMMAND>', \&font_off);

sgml('<GUIBUTTON>', \&bold_on); sgml('</GUIBUTTON>', \&font_off);
sgml('<GUIICON>', \&bold_on); sgml('</GUIICON>', \&font_off);
GUILABEL
GUIMENU
GUIMENUITEM
GUISUBMENU
MENUCHOICE
MOUSEBUTTON

sgml('<ACCEL>', \&bold_on); sgml('</ACCEL>', \&font_off);
sgml('<KEYCAP>', \&bold_on); sgml('</KEYCAP>', \&font_off);
sgml('<KEYSYM>', \&bold_on); sgml('</KEYSYM>', \&font_off);
KEYCODE
KEYCOMBO
SHORTCUT

sgml('<USERINPUT>', \&bold_on); sgml('</USERINPUT>', \&font_off);

sgml('<INTERFACEDEFINITION>', \&bold_on);
sgml('</INTERFACEDEFINITION>', \&font_off);

#

May need to look at the CLASS
sgml('<SYSTEMITEM>', \&bold_on);
sgml('</SYSTEMITEM>', \&font_off);

```
#####
#
# Set italic on enclosed content
#
#####

sgml('<FIRSTTERM>', \&italic_on); sgml('</FIRSTTERM>', \&font_off);

sgml('<FILENAME>', \&italic_on); sgml('</FILENAME>', \&font_off);
sgml('<PARAMETER>', \&italic_on); sgml('</PARAMETER>', \&font_off);
sgml('<PROPERTY>', \&italic_on); sgml('</PROPERTY>', \&font_off);

sgml('<REPLACEABLE>', sub {
  italic_on();
  if($_[0]->in('TOKEN')) {
    # When tokenizing, follow more 'intuitive' convention
    output "<";
  }
});
sgml('</REPLACEABLE>', sub {
  if($_[0]->in('TOKEN')) {
    output ">";
  }
  font_off();
});

sgml('<CITETITLE>', \&italic_on); sgml('</CITETITLE>', \&font_off);
sgml('<FOREIGNPHRASE>', \&italic_on); sgml('</FOREIGNPHRASE>', \&font_off);

sgml('<LINEANNOTATION>', \&italic_on); sgml('</LINEANNOTATION>',
\&font_off);

#####
#
# Other 'inline' elements
#
#####

man_sgml('<EMAIL>', '<');
man_sgml('</EMAIL>', '>');
man_sgml('<OPTIONAL>', '[');
```

```

man_sgml('</OPTIONAL>', ''];

man_sgml('</TRADEMARK>', "\\u\\s-2TM\\s+2\\d");

man_sgml('<COMMENT>', "[Comment: ");
man_sgml('</COMMENT>', "]);

man_sgml('<QUOTE>', "`");
man_sgml('</QUOTE>', "`");

#man_sgml('<LITERAL>', "");
#man_sgml('</LITERAL>', "");

# No special presentation:

# AUTHOR
# AUTHORINITIALS

# ABBREV
# ACTION
# ACRONYM
# ALT
# CITATION
# PHRASE
# QUOTE
# WORDASWORD

# COMPUTEROUTPUT
# MARKUP
# PROMPT
# RETURNVALUE
# SGMLTAG
# TOKEN

# DATABASE
# HARDWARE
# INTERFACE
# MEDIALABEL

# There doesn't seem to be a good way to represent LITERAL in -man

#####
#
# Paragraph and paragraph-like elements
#
#####

```

```

sub
para_start {
output "\n" unless $newline_last++;

# In lists, etc., don't start paragraph with .PP since
# the indentation will be gone.

if($_[0]->parent->ext->{'nbreak'}==1) {
# Usually this is the FIRST element of
# a hanging tag, so we MUST not do a full
# paragraph break.
$_[0]->parent->ext->{'nbreak'} = 2;
} elsif($_[0]->parent->ext->{'nbreak'}==2) {
# Usually these are the NEXT elements of
# a hanging tag. If we break using a blank
# line, we're okay.
output "\n";
} else {
# Normal case. (For indented blocks too, at least
# -man isn't so braindead in this area.)
output ".PP\n";
}
}
# Actually applies to a few other block elements as well
sub para_end {
output "\n" unless $newline_last++;
}

sgml('<PARA>', \&para_start);
sgml('</PARA>', \&para_end);
sgml('<SIMPARA>', \&para_start);
sgml('</SIMPARA>', \&para_end);

# Nothing special, except maybe FIXME set nobreak.
sgml('<INFORMALEXAMPLE>',
\&para_start);
sgml('</INFORMALEXAMPLE>', \&para_end);

#####
#
# Blocks using SS sections
#
#####

```



```

# FIXME: We need to consider the effects of SS
# in a hanging tag :(

# Complete with the optional-title dilemma (again).
sgml('<ABSTRACT>', sub {
  $_[0]->ext->{'title'} = 'ABSTRACT';
  output "\n" unless $newline_last++;
  push_output('string');
});
sgml('</ABSTRACT>', sub {
  my $content = pop_output();

  # As ABSTRACT is never on the same level as RefSect1,
  # this leaves us with only .SS in terms of -man macros.
  output ".SS \"", uc($_[0]->ext->{'title'}), "\"\n";

  output $content;
  output "\n" unless $newline_last++;
});

# Ah, I needed a break. Example always has a title.
man_sgml('<EXAMPLE>', "\n.SS ");
sgml('</EXAMPLE>', \&para_end);

# Same with sidebar.
man_sgml('<SIDEBAR>', "\n.SS ");
sgml('</SIDEBAR>', \&para_end);

# NO title.
man_sgml('<HIGHLIGHTS>',
  "\n.SS HIGHLIGHTS\n");
sgml('</HIGHLIGHTS>', \&para_end);

#####
#
# Indented 'Block' elements
#
#####

sub indent_block_start
{
  output "\n" unless $newline_last++;
  output ".sp\n.RS\n";
}

```

```

sub indent_block_end
{
output "\n" unless $newline_last++;
output ".RE\n";
}

# This element is almost like an admonition (below),
# only the default title is blank :)

sgml('<BLOCKQUOTE>', sub {
$_[0]->ext->{'title'} = "";
output "\n" unless $newline_last++;
push_output('string');
});
sgml('</BLOCKQUOTE>', sub {
my $content = pop_output();

indent_block_start();

if($_[0]->ext->{'title'}) {
output ".B \"", $_[0]->ext->{'title'}, ":\n";
}

output $content;

if($_[0]->ext->{'attribution'}) {
output "\n" unless $newline_last++;
# One place where roff's space-sensitivity makes sense :)
output "\n      -- ";
output
$_[0]->ext->{'attribution'} . "\n";
}

indent_block_end();
});

# Set off admonitions from the rest of the text by indenting.
# FIXME: Need to check if this works inside paragraphs, not enclosing them.
sub admonition_end {
my $content = pop_output();

indent_block_start();

# When the admonition is only one paragraph,
# it looks nicer if the title was inline.
my $num_para;
while ($content =~ /\^\.PP/gm) { $num_para++ }
if($num_para==1) {

```

```

$content =~ s/^\.PP\n//;
}

output ".B \"\" . $_[0]->ext->{'title'} . ":\n";
output $content;

indent_block_end();
}

sgml('<NOTE>', sub {
# We can't see right now whether or not there is a TITLE
# element, so we have to save the output now and add it back
# at the end of this admonition.
$_[0]->ext->{'title'} = 'Note';

# Although admonition_end's indent_block_start will do this,
# we need to synchronize the output _now_
output "\n" unless $newline_last++;

push_output('string');
});
sgml('</NOTE>', \&admonition_end);

#
Same as above.
sgml('<WARNING>', sub {
$_[0]->ext->{'title'} = 'Warning';
output "\n" unless $newline_last++;
push_output('string');
});
sgml('</WARNING>', \&admonition_end);

sgml('<TIP>', sub {
$_[0]->ext->{'title'} = 'Tip';
output "\n" unless $newline_last++;
push_output('string');
});
sgml('</TIP>', \&admonition_end);
sgml('<CAUTION>', sub {
$_[0]->ext->{'title'} = 'Caution';
output "\n" unless $newline_last++;
push_output('string');
});
sgml('</CAUTION>', \&admonition_end);

sgml('<IMPORTANT>', sub {
$_[0]->ext->{'title'} = 'Important';
output "\n" unless $newline_last++;

```

```
push_output('string');
});
sgml('</IMPORTANT>', \&admonition_end);
```

```
#####
#
# Verbatim displays.
#
#####
```

```
sub verbatim_start {
output "\n" unless $newline_last++;

if($_[0]->parent->ext->{'nobreak'}==1) {
# Usually this is the FIRST element of
#
a hanging tag, so we MUST not do a full
# paragraph break.
$_[0]->parent->ext->{'nobreak'} = 2;
} else {
output "\n";
}

output(".nf\n") unless $nocollapse_whitespace++;
}
```

```
sub verbatim_end {
output "\n" unless $newline_last++;
output(".fi\n") unless --$nocollapse_whitespace;
}
```

```
sgml('<PROGRAMLISTING>', \&verbatim_start);
sgml('</PROGRAMLISTING>', \&verbatim_end);
```

```
sgml('<SCREEN>', \&verbatim_start);
sgml('</SCREEN>', \&verbatim_end);
```

```
sgml('<LITERALLAYOUT>', \&verbatim_start);
sgml('</LITERALLAYOUT>', \&verbatim_end);
```

```
#sgml('<SYNOPSIS>', sub {
# if($_[0]->attribute('FORMAT')->value =~ /linespecific/i) {
# &verbatim_start;
# } else {
# roffcmd("");
# }
#});
#
#sgml('</SYNOPSIS>', sub {
# if($_[0]->attribute('FORMAT')->value =~ /linespecific/i) {
# &verbatim_end;
# }
# else {
# roffcmd("");# not sure about this.
# }
#});
sgml('<SYNOPSIS>', \&verbatim_start);
sgml('</SYNOPSIS>', \&verbatim_end);
```

```
#####
#
#
Lists
#
#####
```

```
# Indent nested lists.
sub indent_list_start {
if($list_nestlevel++) {
output "\n" unless $newline_last++;
output ".RS\n";
}
}
sub indent_list_end {
if(--$list_nestlevel) {
output "\n" unless $newline_last++;
output ".RE\n";
}
```

```

}
}

sgml('<VARIABLELIST>', \&indent_list_start);
sgml('</VARIABLELIST>', \&indent_list_end);
sgml('<ITEMIZEDLIST>', \&indent_list_start);
sgml('</ITEMIZEDLIST>', \&indent_list_end);
sgml('<ORDEREDLIST>', sub {
    indent_list_start();
    $_[0]->ext->{'count'} = 1;
});
sgml('</ORDEREDLIST>', \&indent_list_end);

# Output content on one line, bolded.
sgml('<TERM>', sub {
    output "\n" unless $newline_last++;
    output ".TP\n";
    bold_on();
    push_output('string');
});
sgml('</TERM>', sub {
    my $term = pop_output();
    $term =~ tr/\n//;
    output $term;
    font_off();
    output "\n";
    $newline_last = 1;
});

sgml('<LISTITEM>', sub {
    # A bulleted list.
    if($_[0]->in('ITEMIZEDLIST'))
    {
        output "\n" unless $newline_last++;
        output ".TP 0.2i\n\\(bu\n";
    }

    # Need numbers.
    # Assume Arabic numeration for now.
    elsif($_[0]->in('ORDEREDLIST')) {
        output "\n" unless $newline_last++;
        output ".TP ", $_[0]->parent->ext->{'count'}++, ". \n";
    }

    $_[0]->ext->{'nobreak'} = 1;
});

sgml('<SIMPLELIST>', sub {

```

```

$_[0]->ext->{'first_member'} = 1;
});

sgml('<MEMBER>', sub {
my $parent = $_[0]->parent;

if($parent->attribute('TYPE')->value =~ /Inline/i) {
if($parent->ext->{'first_member'}) {
# If this is the first member don't put any commas
$parent->ext->{'first_member'} = 0;
} else {
output ", ";
}
} elsif($parent->attribute('TYPE')->value =~ /Vert/i) {
output "\n" unless $newline_last++;
output "\n";
}
});

```

```

#####
#
# Stuff we don't know how to handle (yet)
#
#####

```

```

# Address blocks:

```

```

# Credit stuff:

```

- ```

#
ACKNO
ADDRESS
AFFILIATION
ARTPAGENUMS
CONTRIBUTION
AUTHORBLURB
AUTHORGROUP
OTHERCREDIT
HONORIFIC

```

```

Areas:

```

- ```

# AREA
# AREASET
# AREASPEC

```

```

#####
#
# Linkage, cross references
#
#####

# Print the URL
sgml('</ULINK>', sub {
# output ' <URL:>', $_[0]->attribute('URL')->value, '>';
$newline_last = 0;
});

# If cross reference target is a RefEntry,
# output CiteRefEntry-style references.
sgml('<XREF>', sub {
my $id = $_[0]->attribute('LINKEND')->value;
my $manref = $Refs->get("refentry:$id");

if($manref) {
my ($title, $sect) = ($manref =~ /(.*)(\(.*\))/);
bold_on();
output $title;
font_off();
output $sect;
} else {
$blank_xrefs++ if $write_manpages;
output "[XRef to $id]";
}

$newline_last = 0;
});

# Anchor

#####
#
# Other handlers
#
#####

man_sgml('[[lt

```



```

    ]', '<');
man_sgml('[gt  ]', '>');
man_sgml('[amp  ]', '&');

#
# Default handlers (uncomment these if needed). Right now, these are set
# up to gag on any unrecognised elements, sdata, processing-instructions,
# or entities.
#
# sgml('start_element',sub { die "Unknown element: " . $_[0]->name; });
# sgml('end_element',"");

# This is for weeding out and escaping certain characters.
# This looks like it's inefficient since it's done on every line, but
# in reality, SGMLSpM and sgmlspl parsing ESIS takes _much_ longer.

sgml('cdata', sub
{
  if(!$write_manpages) { return; }
  elsif($raw_cdata) { output $_[0]; return; }

  # Escape backslashes
  $_[0] =~ s/\\|\\\|\\g;

  # In non-'pre'-type elements:
  if(!$nocollapse_whitespace) {
    # Change tabs to spaces
    $_[0] =~ tr/t/ /;

    # Do not allow indents at beginning of line
    # groff chokes on that.
    if($newline_last) {
      $_[0] =~ s/^ +//;

      # If the
      line is all blank, don't do anything.
      if($_[0] eq "") { return; }

      $_[0] =~ s/^\.\|\\&|\.\/;

      # Argh... roff doesn't like ' either...
      $_[0] =~ s/^\'|\\&|\'/;
    }
  }

  $newline_last = 0;

  output $_[0];

```

```
});
```

```
# When in whitespace-collapsing mode, we disallow consecutive newlines.
```

```
sgml('re', sub  
{  
  if($nocollapse_whitespace || !$newline_last) {  
    output "\n";  
  }  
}
```

```
$newline_last = 1;
```

```
});
```

```
sgml('sdata',sub { die "Unknown SDATA: " . $_[0]; });  
sgml('pi',sub { die "Unknown processing instruction: " . $_[0]; });  
sgml('entity',sub { die "Unknown external entity: " . $_[0]->name; });  
sgml('start_subdoc',sub { die "Unknown subdoc entity: " . $_[0]->name; });  
sgml('end_subdoc','');  
sgml('conforming','');
```

```
1;
```

```
Found in path(s):
```

```
* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/doc/docbook2man-spec.pl  
No license file was found, but licenses were detected in source scan.
```

```
/*
```

```
* tracepath6.c
```

```
*
```

```
* This program is free software; you can redistribute it and/or  
* modify it under the terms of the GNU General Public License  
* as published by the Free Software Foundation; either version  
* 2 of the License, or (at your option) any later version.
```

```
*
```

```
* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>
```

```
*/
```

```
Found in path(s):
```

```
* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/tracepath6.c  
No license file was found, but licenses were detected in source scan.
```

```
/* pg3.c: Packet Generator for packet performance testing.
```

```
*
```

```
* Copyright 2001 by Robert Olsson <robert.olsson@its.uu.se>
```

```
* Uppsala University, Sweden
```

*
* This program is free software; you can redistribute it and/or modify
* it under the terms of the GNU General Public License as published by
* the Free Software Foundation; either version 2 of the License, or
* (at your option) any later version.
*
*
*
*/

Found in path(s):

*/opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/Modules/pg3.c
No license file was found, but licenses were detected in source scan.

/*
* Copyright (c) 1983, 1993
* The Regents of the University of California. All rights reserved.
*
* Redistribution and use in source and binary forms, with or without
* modification, are permitted provided that the following conditions
* are met:
* 1. Redistributions of source code must retain the above copyright
* notice, this list of conditions and the following disclaimer.
* 2. Redistributions in binary form must reproduce the above copyright
* notice, this list of conditions and the following disclaimer in the
* documentation and/or other materials provided with the distribution.
* 3. All advertising materials mentioning features or use of this software
* must display the following acknowledgement:
* This product includes software developed by the University of
* California, Berkeley and its contributors.
* 4. Neither the name of the University nor the names of its contributors
*
* may be used to endorse or promote products derived from this software
* without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*

* @(#)tftp.h 8.1 (Berkeley) 6/2/93

*/

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/tftp.h

No license file was found, but licenses were detected in source scan.

/*

* tracepath.c

*

* This program is free software; you can redistribute it and/or
* modify it under the terms of the GNU General Public License
* as published by the Free Software Foundation; either version
* 2 of the License, or (at your option) any later version.

*

* Authors: Alexey Kuznetsov, <kuznet@ms2.inr.ac.ru>

*/

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/tracepath.c

No license file was found, but licenses were detected in source scan.

License: BSD with advertising and GPLv2+ and Rdisc

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/iputils.spec

No license file was found, but licenses were detected in source scan.

/* Mode: C;

* ifenslave.c: Configure network interfaces for parallel routing.

*

* This program controls the Linux implementation of running multiple
* network interfaces in parallel.

*

* Author: Donald Becker <becker@cesdis.gsfc.nasa.gov>

* Copyright 1994-1996 Donald Becker

*

* This program is free software; you can redistribute it
* and/or modify it under the terms of the GNU General Public
* License as published by the Free Software Foundation.

*

* The author may be reached as becker@CESDIS.gsfc.nasa.gov, or C/O

* Center of Excellence in Space Data and Information Sciences

* Code 930.5, Goddard Space Flight Center, Greenbelt MD 20771

*

- * Changes :
- * - 2000/10/02 Willy Tarreau <willy at meta-x.org> :
- * - few fixes. Master's MAC address is now correctly taken from
- * the first device when not previously set ;
- * - detach support : call BOND_RELEASE to detach an enslaved
- interface.
- * - give a mini-howto from command-line help : # ifenslave -h
- *
- * - 2001/02/16 Chad N. Tindel <ctindel at ieee dot org> :
- * - Master is now brought down before setting the MAC address. In
- * the 2.4 kernel you can't change the MAC address while the device is
- * up because you get EBUSY.
- *
- * - 2001/09/13 Takao Indoh <indou dot takao at jp dot fujitsu dot com>
- * - Added the ability to change the active interface on a mode 1 bond
- * at runtime.
- *
- * - 2001/10/23 Chad N. Tindel <ctindel at ieee dot org> :
- * - No longer set the MAC address of the master. The bond device will
- * take care of this itself
- * - Try the SIOC*** versions of the bonding ioctls before using the
- * old versions
- * - 2002/02/18 Erik Habbinga <erik_habbinga @ hp dot com> :
- * - ifr2.ifr_flags was not initialized in the hwaddr_notset case,
- * SIOCGIFFLAGS now called before hwaddr_notset test
- *
- *
- * - 2002/10/31 Tony Cureington <tony.cureington * hp_com> :
- * - If the master does not have a hardware address when the first slave
- * is enslaved, the master is assigned the hardware address of that
- * slave - there is a comment in bonding.c stating "ifenslave takes
- * care of this now." This corrects the problem of slaves having
- * different hardware addresses in active-backup mode when
- * multiple interfaces are specified on a single ifenslave command
- * (ifenslave bond0 eth0 eth1).
- *
- * - 2003/03/18 - Tsippy Mendelson <tsippy.mendelson at intel dot com> and
- * Shmulik Hen <shmulik.hen at intel dot com>
- * - Moved setting the slave's mac address and opening it, from
- * the application to the driver. This enables support of modes
- * that need to use the unique mac address of each slave.
- * The driver also takes care of closing the slave and restoring its
- * original mac
- address upon release.
- * In addition, block possibility of enslaving before the master is up.
- * This prevents putting the system in an undefined state.
- *
- * - 2003/05/01 - Amir Noam <amir.noam at intel dot com>

- * - Added ABI version control to restore compatibility between
- * new/old ifenslave and new/old bonding.
- * - Prevent adding an adapter that is already a slave.
- * Fixes the problem of stalling the transmission and leaving
- * the slave in a down state.
- *
- * - 2003/05/01 - Shmulik Hen <shmulik.hen at intel dot com>
- * - Prevent enslaving if the bond device is down.
- * Fixes the problem of leaving the system in unstable state and
- * halting when trying to remove the module.
- * - Close socket on all abnormal exists.
- * - Add versioning scheme that follows that of the bonding driver.
- * current version is 1.0.0 as a base line.
- *
- * - 2003/05/22 - Jay Vosburgh <fubar at us dot
- ibm dot com>
- * - ifenslave -c was broken; it's now fixed
- * - Fixed problem with routes vanishing from master during enslave
- * processing.
- *
- * - 2003/05/27 - Amir Noam <amir.noam at intel dot com>
- * - Fix backward compatibility issues:
- * For drivers not using ABI versions, slave was set down while
- * it should be left up before enslaving.
- * Also, master was not set down and the default set_mac_address()
- * would fail and generate an error message in the system log.
- * - For opt_c: slave should not be set to the master's setting
- * while it is running. It was already set during enslave. To
- * simplify things, it is now handled separately.
- *
- * - 2003/12/01 - Shmulik Hen <shmulik.hen at intel dot com>
- * - Code cleanup and style changes
- * set version to 1.1.0
- */

Found in path(s):

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-Uo2GgK2a/ifenslave.tar.gz-cosi-expand-archive-3uHuRhT/ifenslave.c

No license file was found, but licenses were detected in source scan.

<refentry id="pg3">

<refmeta>

<refentrytitle>pg3</refentrytitle>

<manvolnum>8</manvolnum>

<refmiscinfo>iputils-&snapshot;</refmiscinfo>

</refmeta>

```
<refnamediv>
<refname>pg3, ipg, pgset</refname>
<refpurpose>send stream of UDP packets</refpurpose>
</refnamediv>
```

```
<refsynopsisdiv>
<cmdsynopsis>
<command>source ipg</command>
</cmdsynopsis>
<cmdsynopsis>
<command>pg</command>
</cmdsynopsis>
<cmdsynopsis>
<command>pgset</command>
<arg choice="req"><replaceable/COMMAND/</arg>
</cmdsynopsis>
</refsynopsisdiv>
```

```
<refsect1><title>DESCRIPTION</title>
<para>
<command/ipg/ is not a program, it is script which should be sourced
to <command/bash/. When sourced it loads module <filename/pg3/ and
exports a few of functions accessible from parent shell. These macros
are <command/pg/ to start packet injection and to get the results of run;
and <command/pgset/ to setup packet generator.
</para>
```

```
<para>
<command/pgset/ can send the following
commands to module <filename/pg3/:
</para>
</refsect1>
```

```
<refsect1><title>COMMAND</title>
```

```
<variablelist>
```

```
<varlistentry>
<term><option>odev <replaceable/DEVICE/</option></term>
<listitem><para>
Name of Ethernet device to test. See
<link linkend="pg3.warning">warning</link> below.
</para></listitem>
</varlistentry>
```

```
<varlistentry>
<term><option>pkt_size <replaceable/BYTES/</option></term>
```

<listitem><para>

Size of packet to generate. The size includes all the headers: UDP, IP, MAC, but does not account for overhead internal to medium, i.e. FCS and various paddings.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>frags <replaceable/NUMBER/</option></term>

<listitem><para>

Each packet will contain <replaceable/NUMBER/ of fragments.

Maximal amount for linux-2.4 is 6. Far not all the devices support fragmented buffers.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>count <replaceable/NUMBER/</option></term>

<listitem><para>

Send

stream of <replaceable/NUMBER/ of packets and stop after this.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>ipg <replaceable/TIME/</option></term>

<listitem><para>

Introduce artificial delay between packets of <replaceable/TIME/ microseconds.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>dst <replaceable/IP_ADDRESS/</option></term>

<listitem><para>

Select IP destination where the stream is sent to.

Beware, never set this address at random. <command/pg3/ is not a toy, it creates really tough stream. Default value is 0.0.0.0.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>dst <replaceable/MAC_ADDRESS/</option></term>

<listitem><para>

Select MAC destination where the stream is sent to.

Default value is 00:00:00:00:00:00 in hope that this will not be received by any node on LAN.

</para></listitem>

</varlistentry>

<varlistentry>

<term><option>stop</option></term>

<listitem><para>

Abort packet injection.

</para></listitem>

</varlistentry>

</variablelist>

</refsect1>

<refsect1 id="pg3.warning"><title>WARNING</title>

<para>

When output device is set to some random device different of hardware Ethernet device, <command/pg3/ will crash kernel.

</para>

<para>

Do not use it on VLAN, ethertap, VTUN and other devices, which emulate Ethernet not being real Ethernet in fact.

</para>

</refsect1>

<refsect1><title>AUTHOR</title>

<para>

<command/pg3/ was written by <ulink url="mailto:robert.olsson@its.uu.se">

Robert Olsson <robert.olsson@its.uu.se></ulink>.

</para>

</refsect1>

<refsect1><title>SECURITY</title>

<para>

This can be used only by superuser.

</para>

<para>

This tool creates floods of packets which is unlikely to be handled even by high-end machines. For example, it saturates gigabit link with 60 byte packets when used with Intel's e1000. In face of such stream switches, routers and end hosts may deadlock, crash, explode.

Use only in test lab environment.

</para>

</refsect1>

<refsect1><title>AVAILABILITY</title>

<para>

<command/pg3/

is part of <filename/iputils/ package

and the latest versions are available in source form at

```
<ulink url="http://www.skbuff.net/iptables/iptables-current.tar.bz2">
http://www.skbuff.net/iptables/iptables-current.tar.bz2</ulink>.
</para>
</refsect1>
```

```
<![IGNORE[
<refsect1><title>COPYING</title>
<para>
<literallayout>
This documentation is free software; you can redistribute
it and/or modify it under the terms of the GNU General Public
License Version 2.
```

```
This program is distributed in the hope that it will be
useful, but WITHOUT ANY WARRANTY; without even the implied
warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.
See the GNU General Public License for more details.
```

```
For more details see the file COPYING in the source
distribution of Linux kernel of version 2.4.
```

```
</literallayout>
</para>
</refsect1>
]]>
```

```
</refentry>
```

Found in path(s):

```
* /opt/cola/permits/2005421805_1715245725.2397015/0/iptables-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-
Uo2GgK2a/iptables-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iptables-s20071127/doc/pg3.shtml
No license file was found, but licenses were detected in source scan.
```

```
/*
```

- * Copyright (c) 1989 The Regents of the University of California.
- * All rights reserved.
- *
- * This code is derived from software contributed to Berkeley by
- * Mike Muuss.
- *
- * Redistribution and use in source and binary forms, with or without
- * modification, are permitted provided that the following conditions
- * are met:
- * 1. Redistributions of source code must retain the above copyright
- * notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer in the
- * documentation and/or other materials provided with the distribution.
- * 3. All advertising materials mentioning features or use of this software

```

* must display the following acknowledgement:
* This product includes software developed by the University of
* California, Berkeley and its contributors.
*
4. Neither the name of the University nor the names of its contributors
* may be used to endorse or promote products derived from this software
* without specific prior written permission.
*
* THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS'' AND
* ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
* ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
* FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
* DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
* OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
* LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
* OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
* SUCH DAMAGE.
*/
/*
* P I N G . C
*
* Using the InterNet Control Message Protocol (ICMP) "ECHO" facility,
* measure round-trip-delays and packet loss across network paths.
*
* Author -
* Mike Muuss
* U. S. Army Ballistic Research Laboratory
* December, 1983
*
* Status -
* Public Domain. Distribution Unlimited.
* Bugs -
* More statistics could always be gathered.
* This program has to run SUID to ROOT to access the ICMP socket.
*/

```

Found in path(s):

```

* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-
Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/ping.c
* /opt/cola/permits/2005421805_1715245725.2397015/0/iputils-20071127-17.el6_4-1.src.rpm-cosi-expand-archive-
Uo2GgK2a/iputils-s20071127.tar.bz2-cosi-expand-archive-lhfYwvyj/iputils-s20071127/ping6.c

```

1.194 upstart 0.6.5-12.el6_4.1

1.194.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we

want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and

distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are

prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each

time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING

OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN
IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE
POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w` and `show c` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w` and `show c`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program `Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.195 wget 1.12

1.195.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<https://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to

freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a

covered work is

covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently

reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or

hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are

specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided

above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <https://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands

might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <https://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <https://www.gnu.org/philosophy/why-not-lgpl.html>.

1.196 zlib 1.2.3-29.el6

1.196.1 Available under license :

Boost Software License - Version 1.0 - August 17th, 2003

Permission is hereby granted, free of charge, to any person or organization obtaining a copy of the software and accompanying documentation covered by this license (the "Software") to use, reproduce, display, distribute, execute, and transmit the Software, and to prepare derivative works of the Software, and to permit third-parties to whom the Software is furnished to do so, all subject to the following:

The copyright notices in the Software and this entire statement, including the above license grant, this restriction and the following disclaimer, must be included in all copies of the Software, in whole or in part, and all derivative works of the Software, unless such copies or derivative works are solely in the form of machine-executable object code generated by a source language processor.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS

FOR A PARTICULAR PURPOSE, TITLE AND NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS OR ANYONE DISTRIBUTING THE SOFTWARE BE LIABLE FOR ANY DAMAGES OR OTHER LIABILITY, WHETHER IN CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.197 pcre 7.8-6.el6

1.197.1 Available under license :

PCRE LICENCE

Please see the file LICENCE in the PCRE distribution for licensing details.

End

PCRE LICENCE

PCRE is a library of functions to support regular expressions whose syntax and semantics are as close as possible to those of the Perl 5 language.

Release 7 of PCRE is distributed under the terms of the "BSD" licence, as specified below. The documentation for PCRE, supplied in the "doc" directory, is distributed under the same terms as the software itself.

The basic library functions are written in C and are freestanding. Also included in the distribution is a set of C++ wrapper functions.

THE BASIC LIBRARY FUNCTIONS

Written by: Philip Hazel
Email local part: ph10
Email domain: cam.ac.uk

University of Cambridge Computing Service,
Cambridge, England.

Copyright (c) 1997-2008 University of Cambridge
All rights reserved.

THE C++ WRAPPER FUNCTIONS

Contributed by: Google Inc.

Copyright (c) 2007-2008, Google Inc.
All rights reserved.

THE "BSD" LICENCE

Redistribution and

use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * Neither the name of the University of Cambridge nor the name of Google Inc. nor the names of their contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

End

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT

OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.198 setup 2.8.14-20.el6

1.198.1 Available under license :

Setup package is public domain.

You are free to use, copy, distribute or modify included files without restrictions.

1.199 less 436-10.el6

1.199.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that

is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains

in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the

terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product

(including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a

typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the

entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains

a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work

occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant

patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory

patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the

GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

Less License

Less

Copyright (C) 1984-2009 Mark Nudelman

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.200 libssh2 1.4.2-1.el6

1.200.1 Available under license :

- /* Copyright (c) 2004-2007 Sara Golemon <sarag@libssh2.org>
- * Copyright (c) 2005,2006 Mikhail Gusarov <dottedmag@dottedmag.net>
- * Copyright (c) 2006-2007 The Written Word, Inc.
- * Copyright (c) 2007 Eli Fant <elifantu@mail.ru>
- * Copyright (c) 2009 Daniel Stenberg
- * Copyright (C) 2008, 2009 Simon Josefsson
- * All rights reserved.
- *

- * Redistribution and use in source and binary forms,
- * with or without modification, are permitted provided
- * that the following conditions are met:
- *
- * Redistributions of source code must retain the above
- * copyright notice, this list of conditions and the
- * following disclaimer.
- *
- * Redistributions in binary form must reproduce the above
- * copyright notice, this list of conditions and the following
- * disclaimer in the documentation and/or other materials
- * provided with the distribution.
- *
- * Neither the name of the copyright holder nor the names
- * of any other contributors may be used to endorse or
- * promote products
- derived from this software without
- * specific prior written permission.
- *
- * THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND
- * CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES,
- * INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES
- * OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
- * ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR
- * CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
- * SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING,
- * BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR
- * SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS
- * INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY,
- * WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING
- * NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE
- * USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY
- * OF SUCH DAMAGE.
- */

1.201 python-nss 0.11

1.201.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
 Everyone is permitted to copy and distribute verbatim copies
 of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts

as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original

author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU

operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does

and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot

use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues),

conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute

so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time.

Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and

conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should

also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and

modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further

restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will

be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program

`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

MOZILLA PUBLIC LICENSE

Version 1.1

1. Definitions.

1.0.1. "Commercial Use" means distribution or otherwise making the Covered Code available to a third party.

1.1. "Contributor" means each entity that creates or contributes to the creation of Modifications.

1.2. "Contributor Version" means the combination of the Original Code, prior Modifications used by a Contributor, and the Modifications made by that particular Contributor.

1.3. "Covered Code" means the Original Code or Modifications or the combination of the Original Code and Modifications, in each case including portions thereof.

1.4. "Electronic Distribution Mechanism" means a mechanism generally accepted in the software development community for the electronic transfer of data.

1.5. "Executable" means Covered Code in any form other than Source Code.

1.6. "Initial Developer" means the individual or entity identified as the Initial Developer in the Source Code notice required by Exhibit A.

1.7. "Larger Work" means a work which combines Covered Code or portions thereof with code not governed by the terms of this License.

1.8. "License" means this document.

1.8.1. "Licensable" means having the right to grant, to the maximum

extent possible, whether at the time of the initial grant or subsequently acquired, any and all of the rights conveyed herein.

1.9. "Modifications" means any addition to or deletion from the substance or structure of either the Original Code or any previous Modifications. When Covered Code is released as a series of files, a Modification is:

A. Any addition to or deletion from the contents of a file containing Original Code or previous Modifications.

B. Any new file that contains any part of the Original Code or previous Modifications.

1.10. "Original Code" means Source Code of computer software code which is described in the Source Code notice required by Exhibit A as Original Code, and which, at the time of its release under this License is not already Covered Code governed by this License.

1.10.1. "Patent Claims" means any patent claim(s), now owned or hereafter acquired, including without limitation, method, process, and apparatus claims, in any patent Licensable by grantor.

1.11. "Source Code" means the preferred form of the Covered Code for making modifications to it, including all modules it contains, plus any associated interface definition files, scripts used to control compilation and installation of an Executable, or source code differential comparisons against either the Original Code or another well known, available Covered Code of the Contributor's choice. The Source Code can be in a compressed or archival form, provided the appropriate decompression or de-archiving software is widely available for no charge.

1.12. "You" (or "Your") means an individual or a legal entity exercising rights under, and complying with all of the terms of, this License or a future version of this License issued under Section 6.1. For legal entities, "You" includes any entity which controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. Source Code License.

2.1. The Initial Developer Grant.

The Initial Developer hereby grants You a world-wide, royalty-free,

non-exclusive license, subject to third party intellectual property

claims:

(a) under intellectual property rights (other than patent or trademark) Licensable by Initial Developer to use, reproduce, modify, display, perform, sublicense and distribute the Original Code (or portions thereof) with or without Modifications, and/or as part of a Larger Work; and

(b) under Patents Claims infringed by the making, using or selling of Original Code, to make, have made, use, practice, sell, and offer for sale, and/or otherwise dispose of the Original Code (or portions thereof).

(c) the licenses granted in this Section 2.1(a) and (b) are effective on the date Initial Developer first distributes Original Code under the terms of this License.

(d) Notwithstanding Section 2.1(b) above, no patent license is granted: 1) for code that You delete from the Original Code; 2) separate from the Original Code; or 3) for infringements

caused

by: i) the modification of the Original Code or ii) the combination of the Original Code with other software or devices.

2.2. Contributor Grant.

Subject to third party intellectual property claims, each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license

(a) under intellectual property rights (other than patent or trademark) Licensable by Contributor, to use, reproduce, modify, display, perform, sublicense and distribute the Modifications created by such Contributor (or portions thereof) either on an unmodified basis, with other Modifications, as Covered Code and/or as part of a Larger Work; and

(b) under Patent Claims infringed by the making, using, or selling of Modifications made by that Contributor either alone and/or in combination with its Contributor Version (or portions of such combination), to make, use, sell, offer for sale, have made, and/or otherwise dispose of: 1) Modifications made by that Contributor (or portions thereof); and 2) the combination of Modifications made by that Contributor with its Contributor Version (or portions of such combination).

(c) the licenses granted in Sections 2.2(a) and 2.2(b) are effective on the date Contributor first makes Commercial Use of

the Covered Code.

(d) Notwithstanding Section 2.2(b) above, no patent license is granted: 1) for any code that Contributor has deleted from the Contributor Version; 2) separate from the Contributor Version; 3) for infringements caused by: i) third party modifications of Contributor Version or ii) the combination of Modifications made by that Contributor with other software (except as part of the Contributor Version) or other devices; or 4) under Patent Claims infringed by Covered Code in the absence of Modifications made by that Contributor.

3. Distribution Obligations.

3.1. Application of License.

The Modifications which You create or to which You contribute are governed by the terms of this License, including without limitation Section 2.2. The Source Code version of Covered Code may be distributed only under the terms of this License or a future version of this License released under Section 6.1, and You must include a copy of this License with every copy of the Source Code You distribute. You may not offer or impose any terms on any Source Code version that alters or restricts the applicable version of this License or the recipients' rights hereunder. However, You may include an additional document offering the additional rights described in Section 3.5.

3.2. Availability of Source Code.

Any Modification which You create or to which You contribute must be made available in Source Code form under the terms of this License either on the same media as an Executable version or via an accepted Electronic Distribution Mechanism to anyone to whom you made an Executable version available; and if made available via Electronic Distribution Mechanism, must remain available for at least twelve (12) months after the date it initially became available, or at least six (6) months after a subsequent version of that particular Modification has been made available to such recipients. You are responsible for ensuring that the Source Code version remains available even if the Electronic Distribution Mechanism is maintained by a third party.

3.3. Description of Modifications.

You must cause all Covered Code to which You contribute to contain a file documenting the changes You made to create that Covered Code and the date of any change. You must include a prominent statement that

the Modification is derived, directly or indirectly, from Original Code provided by the Initial Developer and including the name of the

Initial Developer in (a) the Source Code, and (b) in any notice in an Executable version or related documentation in which You describe the origin or ownership of the Covered Code.

3.4. Intellectual Property Matters

(a) Third Party Claims.

If Contributor has knowledge that a license under a third party's intellectual property rights is required to exercise the rights granted by such Contributor under Sections 2.1 or 2.2, Contributor must include a text file with the Source Code distribution titled "LEGAL" which describes the claim and the party making the claim in sufficient detail that a recipient will know whom to contact. If Contributor obtains such knowledge after the Modification is made available as described in Section 3.2, Contributor shall promptly modify the LEGAL file in all copies Contributor makes available thereafter and shall take other steps (such as notifying appropriate mailing lists or newsgroups) reasonably calculated to inform those who received the Covered Code that new knowledge has been obtained.

(b) Contributor APIs.

If Contributor's Modifications include an application programming interface and Contributor has knowledge of patent licenses which are reasonably necessary to implement that API, Contributor must also include this information in the LEGAL file.

(c) Representations.

Contributor represents that, except as disclosed pursuant to Section 3.4(a) above, Contributor believes that Contributor's Modifications are Contributor's original creation(s) and/or Contributor has sufficient rights to grant the rights conveyed by

this License.

3.5. Required Notices.

You must duplicate the notice in Exhibit A in each file of the Source Code. If it is not possible to put such notice in a particular Source Code file due to its structure, then You must include such notice in a location (such as a relevant directory) where a user would be likely to look for such a notice. If You created one or more Modification(s) You may add your name as a Contributor to the notice described in Exhibit A. You must also duplicate this License in any documentation for the Source Code where You describe recipients' rights or ownership rights relating to Covered Code. You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Code. However, You may do so only on Your own behalf, and not on behalf of the Initial Developer or any Contributor. You must make it absolutely clear than

any such warranty, support, indemnity or liability obligation is offered by You alone, and You hereby agree to indemnify the Initial Developer and every Contributor for any liability incurred by the Initial Developer or such Contributor as a result of warranty, support, indemnity or liability terms You offer.

3.6. Distribution of Executable Versions.

You may distribute Covered Code in Executable form only if the requirements of Section 3.1-3.5 have been met for that Covered Code, and if You include a notice stating that the Source Code version of the Covered Code is available under the terms of this License, including a description of how and where You have fulfilled the obligations of Section 3.2. The notice must be conspicuously included in any notice in an Executable version, related documentation or collateral in which You describe recipients' rights relating to the Covered Code. You may distribute the Executable version of Covered

Code or ownership rights under a license of Your choice, which may contain terms different from this License, provided that You are in compliance with the terms of this License and that the license for the Executable version does not attempt to limit or alter the recipient's rights in the Source Code version from the rights set forth in this License. If You distribute the Executable version under a different license You must make it absolutely clear that any terms which differ from this License are offered by You alone, not by the Initial Developer or any Contributor. You hereby agree to indemnify the Initial Developer and every Contributor for any liability incurred by the Initial Developer or such Contributor as a result of any such terms You offer.

3.7. Larger Works.

You may create a Larger Work by combining Covered Code with other code not governed by the terms of this License and distribute the Larger Work as a single product. In such a case, You must make sure the requirements of this License are fulfilled for the Covered Code.

4. Inability to Comply Due to Statute or Regulation.

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Code due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be included in the LEGAL file described in Section 3.4 and must be included with all distributions of the Source Code. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to

understand it.

5. Application of this License.

This License applies to code to which the Initial Developer has attached the notice in Exhibit A and to related Covered Code.

6. Versions of the License.

6.1. New Versions.

Netscape Communications Corporation ("Netscape") may publish revised and/or new versions of the License from time to time. Each version will be given a distinguishing version number.

6.2. Effect of New Versions.

Once Covered Code has been published under a particular version of the License, You may always continue to use it under the terms of that version. You may also choose to use such Covered Code under the terms of any subsequent version of the License published by Netscape. No one other than Netscape has the right to modify the terms applicable to Covered Code created under this License.

6.3. Derivative Works.

If You create or use a modified version of this License (which you may only do in order to apply it to code which is not already Covered Code governed by this License), You must (a) rename

Your license so that

the phrases "Mozilla", "MOZILLAPL", "MOZPL", "Netscape", "MPL", "NPL" or any confusingly similar phrase do not appear in your license (except to note that your license differs from this License) and (b) otherwise make it clear that Your version of the license contains terms which differ from the Mozilla Public License and Netscape Public License. (Filling in the name of the Initial Developer, Original Code or Contributor in the notice described in Exhibit A shall not of themselves be deemed to be modifications of this License.)

7. DISCLAIMER OF WARRANTY.

COVERED CODE IS PROVIDED UNDER THIS LICENSE ON AN "AS IS" BASIS, WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, WITHOUT LIMITATION, WARRANTIES THAT THE COVERED CODE IS FREE OF DEFECTS, MERCHANTABILITY, FIT FOR A PARTICULAR PURPOSE OR NON-INFRINGEMENT. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE COVERED CODE IS WITH YOU. SHOULD ANY COVERED CODE PROVE DEFECTIVE IN ANY RESPECT, YOU (NOT THE INITIAL DEVELOPER OR ANY OTHER CONTRIBUTOR) ASSUME THE COST OF ANY NECESSARY SERVICING, REPAIR OR CORRECTION. THIS DISCLAIMER OF WARRANTY CONSTITUTES AN ESSENTIAL PART OF THIS LICENSE. NO USE OF

ANY COVERED CODE IS AUTHORIZED HEREUNDER EXCEPT UNDER THIS DISCLAIMER.

8. TERMINATION.

8.1. This License and the rights granted hereunder will terminate automatically if You fail to comply with terms herein and fail to cure such breach within 30 days of becoming aware of the breach. All sublicenses to the Covered Code which are properly granted shall survive any termination of this License. Provisions which, by their nature, must remain in effect beyond the termination of this License shall survive.

8.2. If You initiate litigation by asserting a patent infringement claim (excluding declaratory judgment actions) against Initial Developer or

a Contributor (the Initial Developer or Contributor against whom You file such action is referred to as "Participant") alleging that:

(a) such Participant's Contributor Version directly or indirectly infringes any patent, then any and all rights granted by such Participant to You under Sections 2.1 and/or 2.2 of this License shall, upon 60 days notice from Participant terminate prospectively, unless if within 60 days after receipt of notice You either: (i) agree in writing to pay Participant a mutually agreeable reasonable royalty for Your past and future use of Modifications made by such Participant, or (ii) withdraw Your litigation claim with respect to the Contributor Version against such Participant. If within 60 days of notice, a reasonable royalty and payment arrangement are not mutually agreed upon in writing by the parties or the litigation claim is not withdrawn, the rights granted by Participant to You under Sections 2.1 and/or 2.2 automatically terminate at the expiration of the 60 day notice period specified above.

(b) any software, hardware, or device, other than such Participant's Contributor Version, directly or indirectly infringes any patent, then any rights granted to You by such Participant under Sections 2.1(b) and 2.2(b) are revoked effective as of the date You first made, used, sold, distributed, or had made, Modifications made by that Participant.

8.3. If You assert a patent infringement claim against Participant alleging that such Participant's Contributor Version directly or indirectly infringes any patent where such claim is resolved (such as by license or settlement) prior to the initiation of patent infringement litigation, then the reasonable value of the licenses granted by such Participant under Sections 2.1 or 2.2 shall be taken into account in determining the amount or value of any payment

or

license.

8.4. In the event of termination under Sections 8.1 or 8.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or any distributor hereunder prior to termination shall survive termination.

9. LIMITATION OF LIABILITY.

UNDER NO CIRCUMSTANCES AND UNDER NO LEGAL THEORY, WHETHER TORT (INCLUDING NEGLIGENCE), CONTRACT, OR OTHERWISE, SHALL YOU, THE INITIAL DEVELOPER, ANY OTHER CONTRIBUTOR, OR ANY DISTRIBUTOR OF COVERED CODE, OR ANY SUPPLIER OF ANY OF SUCH PARTIES, BE LIABLE TO ANY PERSON FOR ANY INDIRECT, SPECIAL, INCIDENTAL, OR CONSEQUENTIAL DAMAGES OF ANY CHARACTER INCLUDING, WITHOUT LIMITATION, DAMAGES FOR LOSS OF GOODWILL, WORK STOPPAGE, COMPUTER FAILURE OR MALFUNCTION, OR ANY AND ALL OTHER COMMERCIAL DAMAGES OR LOSSES, EVEN IF SUCH PARTY SHALL HAVE BEEN INFORMED OF THE POSSIBILITY OF SUCH DAMAGES. THIS LIMITATION OF LIABILITY SHALL

NOT APPLY TO LIABILITY FOR DEATH OR PERSONAL INJURY RESULTING FROM SUCH PARTY'S NEGLIGENCE TO THE EXTENT APPLICABLE LAW PROHIBITS SUCH LIMITATION. SOME JURISDICTIONS DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THIS EXCLUSION AND LIMITATION MAY NOT APPLY TO YOU.

10. U.S. GOVERNMENT END USERS.

The Covered Code is a "commercial item," as that term is defined in 48 C.F.R. 2.101 (Oct. 1995), consisting of "commercial computer software" and "commercial computer software documentation," as such terms are used in 48 C.F.R. 12.212 (Sept. 1995). Consistent with 48 C.F.R. 12.212 and 48 C.F.R. 227.7202-1 through 227.7202-4 (June 1995), all U.S. Government End Users acquire Covered Code with only those rights set forth herein.

11. MISCELLANEOUS.

This License represents the complete agreement concerning subject matter hereof. If any provision of this License is held to be unenforceable,

such provision shall be reformed only to the extent necessary to make it enforceable. This License shall be governed by California law provisions (except to the extent applicable law, if any, provides otherwise), excluding its conflict-of-law provisions. With respect to disputes in which at least one party is a citizen of, or an entity chartered or registered to do business in the United States of America, any litigation relating to this License shall be

subject to the jurisdiction of the Federal Courts of the Northern District of California, with venue lying in Santa Clara County, California, with the losing party responsible for costs, including without limitation, court costs and reasonable attorneys' fees and expenses. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not apply to this License.

12. RESPONSIBILITY FOR CLAIMS.

As between Initial Developer and the Contributors, each party is responsible for claims and damages arising, directly or indirectly, out of its utilization of rights under this License and You agree to work with Initial Developer and Contributors to distribute such responsibility on an equitable basis. Nothing herein is intended or shall be deemed to constitute any admission of liability.

13. MULTIPLE-LICENSED CODE.

Initial Developer may designate portions of the Covered Code as "Multiple-Licensed". "Multiple-Licensed" means that the Initial Developer permits you to utilize portions of the Covered Code under Your choice of the NPL or the alternative licenses, if any, specified by the Initial Developer in the file described in Exhibit A.

EXHIBIT A -Mozilla Public License.

``The contents of this file are subject to the Mozilla Public License

Version 1.1 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <http://www.mozilla.org/MPL/>

Software distributed under the License is distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License for the specific language governing rights and limitations under the License.

The Original Code is a Python binding for Network Security Services (NSS).

The Initial Developer of the Original Code is Red Hat, Inc.
(Author: John Dennis <jdennis@redhat.com>)

Portions created by the Initial Developer are Copyright (C) 2008,2009 the Initial Developer. All Rights Reserved.

Contributor(s):

Alternatively, the contents of this file may be used under the terms of either the GNU General Public License Version 2 or later (the "GPL"), or the GNU Lesser General Public License Version

2.1 or later (the "LGPL"),

in which case the provisions of the GPL or the LGPL are applicable instead of those above. If you wish to allow use of your version of this file only under the terms of either the GPL or the LGPL, and not to allow others to use your version of this file under the terms of the MPL, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the GPL or the LGPL. If you do not delete the provisions above, a recipient may use your version of this file under the terms of any one of the MPL, the GPL or the LGPL.

[NOTE: The text of this Exhibit A may differ slightly from the text of the notices in the Source Code files of the Original Code. You should use the text of this Exhibit A rather than the text found in the Original Code Source Code for Your Modifications.]

1.202 nss-util 3.14.3-3.el6_4

1.202.1 Available under license :

NSS is available under the Mozilla Public License, version 2, a copy of which is below.

Note on GPL Compatibility

The MPL 2, section 3.3, permits you to combine NSS with code under the GNU General Public License (GPL) version 2, or any later version of that license, to make a Larger Work, and distribute the result under the GPL. The only condition is that you must also make NSS, and any changes you have made to it, available to recipients under the terms of the MPL 2 also.

Anyone who receives the combined code from you does not have to continue to dual licence in this way, and may, if they wish, distribute under the terms of either of the two licences - either the MPL alone or the GPL alone. However, we discourage people from distributing copies of NSS under the GPL alone, because it means that any improvements they make cannot be reincorporated into the main version of NSS. There is never a need to do this for license compatibility reasons.

Note on LGPL Compatibility

The

above also applies to combining MPLed code in a single library with code under the GNU Lesser General Public License (LGPL) version 2.1, or any later version of that license. If the LGPLed code and the MPLed code are not in the same library, then the copyleft coverage of the two licences does not overlap, so no issues arise.

Mozilla Public License Version 2.0

=====

1. Definitions

1.1. "Contributor"

means each individual or legal entity that creates, contributes to the creation of, or owns Covered Software.

1.2. "Contributor Version"

means the combination of the Contributions of others (if any) used by a Contributor and that particular Contributor's Contribution.

1.3. "Contribution"

means Covered Software of a particular Contributor.

1.4. "Covered Software"

means Source Code Form to which the initial Contributor has attached the notice in Exhibit A, the Executable Form of such Source Code Form, and Modifications of such Source Code Form, in each case including portions thereof.

1.5. "Incompatible With Secondary Licenses"

means

(a) that the initial Contributor has attached the notice described in Exhibit B to the Covered Software; or

(b) that the Covered Software was made available under the terms of version 1.1 or earlier of the License, but not also under the terms of a Secondary License.

1.6. "Executable Form"

means any form of the work other than Source Code Form.

1.7. "Larger Work"

means a work that combines Covered Software with other material, in a separate file or files, that is not Covered Software.

1.8. "License"

means this document.

1.9. "Licensable"

means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently, any and all of the rights conveyed by this License.

1.10. "Modifications"

means any
of the following:

(a) any file in Source Code Form that results from an addition to, deletion from, or modification of the contents of Covered Software; or

(b) any new file in Source Code Form that contains any Covered Software.

1.11. "Patent Claims" of a Contributor

means any patent claim(s), including without limitation, method, process, and apparatus claims, in any patent Licensable by such Contributor that would be infringed, but for the grant of the License, by the making, using, selling, offering for sale, having made, import, or transfer of either its Contributions or its Contributor Version.

1.12. "Secondary License"

means either the GNU General Public License, Version 2.0, the GNU Lesser General Public License, Version 2.1, the GNU Affero General Public License, Version 3.0, or any later versions of those licenses.

1.13. "Source Code Form"

means the form of the work preferred for making modifications.

1.14.

"You" (or "Your")

means an individual or a legal entity exercising rights under this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. License Grants and Conditions

2.1. Grants

Each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license:

- (a) under intellectual property rights (other than patent or trademark) Licensable by such Contributor to use, reproduce, make available, modify, display, perform, distribute, and otherwise exploit its Contributions, either on an unmodified basis, with Modifications, or as part of a Larger Work; and
- (b) under Patent Claims of such Contributor to make, use, sell, offer for sale, have made, import, and otherwise transfer either its Contributions or its Contributor Version.

2.2. Effective Date

The licenses granted in Section 2.1 with respect to any Contribution become effective for each Contribution on the date the Contributor first distributes such Contribution.

2.3. Limitations on Grant Scope

The licenses granted in this Section 2 are the only rights granted under this License. No additional rights or licenses will be implied from the distribution or licensing of Covered Software under this License. Notwithstanding Section 2.1(b) above, no patent license is granted by a Contributor:

- (a) for any code that a Contributor has removed from Covered Software; or
- (b) for infringements caused by: (i) Your and any other third party's modifications of Covered Software, or (ii) the combination of its Contributions with other software (except as part of its Contributor Version); or
- (c) under Patent Claims infringed by Covered Software in the absence of its Contributions.

This License does not grant any rights in the trademarks, service marks, or logos of any Contributor (except as may be necessary to comply with the notice requirements in Section 3.4).

2.4. Subsequent Licenses

No Contributor makes additional grants as a result of Your choice to distribute the Covered Software under a subsequent version of this License (see Section 10.2) or under the terms of a Secondary License (if permitted under the terms of Section 3.3).

2.5. Representation

Each Contributor represents that the Contributor believes its Contributions are its original creation(s) or it has sufficient rights to grant the rights to its Contributions conveyed by this License.

2.6. Fair Use

This License is not intended to limit any rights You have under applicable copyright doctrines of fair use, fair dealing, or other equivalents.

2.7. Conditions

Sections

3.1, 3.2, 3.3, and 3.4 are conditions of the licenses granted in Section 2.1.

3. Responsibilities

3.1. Distribution of Source Form

All distribution of Covered Software in Source Code Form, including any Modifications that You create or to which You contribute, must be under the terms of this License. You must inform recipients that the Source Code Form of the Covered Software is governed by the terms of this License, and how they can obtain a copy of this License. You may not attempt to alter or restrict the recipients' rights in the Source Code Form.

3.2. Distribution of Executable Form

If You distribute Covered Software in Executable Form then:

- (a) such Covered Software must also be made available in Source Code Form, as described in Section 3.1, and You must inform recipients of the Executable Form how they can obtain a copy of such Source Code Form by reasonable means in a timely manner, at a charge no more than the cost of

distribution to the recipient; and

(b) You may distribute such Executable Form under the terms of this License, or sublicense it under different terms, provided that the license for the Executable Form does not attempt to limit or alter the recipients' rights in the Source Code Form under this License.

3.3. Distribution of a Larger Work

You may create and distribute a Larger Work under terms of Your choice, provided that You also comply with the requirements of this License for the Covered Software. If the Larger Work is a combination of Covered Software with a work governed by one or more Secondary Licenses, and the Covered Software is not Incompatible With Secondary Licenses, this License permits You to additionally distribute such Covered Software under the terms of such Secondary License(s), so that the recipient of the Larger Work may, at their option, further distribute the Covered Software under the terms of either this License or such Secondary License(s).

3.4.

Notices

You may not remove or alter the substance of any license notices (including copyright notices, patent notices, disclaimers of warranty, or limitations of liability) contained within the Source Code Form of the Covered Software, except that You may alter any license notices to the extent required to remedy known factual inaccuracies.

3.5. Application of Additional Terms

You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Software. However, You may do so only on Your own behalf, and not on behalf of any Contributor. You must make it absolutely clear that any such warranty, support, indemnity, or liability obligation is offered by You alone, and You hereby agree to indemnify every Contributor for any liability incurred by such Contributor as a result of warranty, support, indemnity or liability terms You offer. You may include additional disclaimers of warranty and limitations of liability specific to any jurisdiction.

4. Inability to Comply Due to Statute or Regulation

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Software due to

statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be placed in a text file included with all distributions of the Covered Software under this License. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Termination

5.1. The rights granted under this License will terminate automatically if You fail to comply with any of its terms. However, if You become compliant, then the rights granted under this License from a particular Contributor are reinstated (a) provisionally, unless and until such Contributor explicitly and finally terminates Your grants, and (b) on an ongoing basis, if such Contributor fails to notify You of the non-compliance by some reasonable means prior to 60 days after You have come back into compliance. Moreover, Your grants from a particular Contributor are reinstated on an ongoing basis if such Contributor notifies You of the non-compliance by some reasonable means, this is the first time You have received notice of non-compliance with this License from such Contributor, and You become compliant prior to 30 days after Your receipt of the notice.

5.2. If You initiate litigation against any entity by asserting a patent infringement claim (excluding declaratory judgment actions, counter-claims, and cross-claims) alleging that a Contributor Version directly or indirectly infringes any patent, then the rights granted to You by any and all Contributors for the Covered Software under Section 2.1 of this License shall terminate.

5.3. In the event of termination under Sections 5.1 or 5.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or Your distributors under this License prior to termination shall survive termination.

```
*
*
* 6. Disclaimer of Warranty
* -----
*
* Covered Software is provided under this License on an "as is"
* basis, without warranty of any kind, either expressed, implied, or
* statutory, including, without limitation, warranties that the
* Covered Software is free of defects, merchantable, fit for a
```


* particular purpose or non-infringing. The entire
risk as to the *
* quality and performance of the Covered Software is with You. *
* Should any Covered Software prove defective in any respect, You *
* (not any Contributor) assume the cost of any necessary servicing, *
* repair, or correction. This disclaimer of warranty constitutes an *
* essential part of this License. No use of any Covered Software is *
* authorized under this License except under this disclaimer. *

* *
* 7. Limitation of Liability *
* ----- *

* Under no circumstances
and under no legal theory, whether tort *
* (including negligence), contract, or otherwise, shall any *
* Contributor, or anyone who distributes Covered Software as *
* permitted above, be liable to You for any direct, indirect, *
* special, incidental, or consequential damages of any character *
* including, without limitation, damages for lost profits, loss of *
* goodwill, work stoppage, computer failure or malfunction, or any *
* and all other commercial damages or losses, even if such party *
* shall have been informed of the possibility of such damages. This *
* limitation of liability shall not apply to liability for death or *
* personal injury resulting from such party's negligence to the *
* extent applicable law prohibits such limitation. Some *
* jurisdictions do not allow the exclusion or limitation of *
* incidental or consequential damages, so this exclusion and *

limitation may not apply to You. *

* *

8. Litigation

Any litigation relating to this License may be brought only in the courts of a jurisdiction where the defendant maintains its principal place of business and such litigation shall be governed by laws of that jurisdiction, without reference to its conflict-of-law provisions. Nothing in this Section shall prevent a party's ability to bring cross-claims or counter-claims.

9. Miscellaneous

This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not be used to construe this License against a Contributor.

10. Versions of the License

10.1. New Versions

Mozilla Foundation is the license steward. Except as provided in Section 10.3, no one other than the license steward has the right to modify or publish new versions of this License. Each version will be given a distinguishing version number.

10.2. Effect of New Versions

You may distribute the Covered Software under the terms of the version of the License under which You originally received the Covered Software, or under the terms of any subsequent version published by the license steward.

10.3. Modified Versions

If you create software not governed by this License, and you want to create a new license for such software, you may create and use a modified version of this License if you rename the license and remove any references to the name of the license steward (except to note that such modified license differs from this License).

10.4. Distributing

Source Code Form that is Incompatible With Secondary Licenses

If You choose to distribute Source Code Form that is Incompatible With Secondary Licenses under the terms of this version of the License, the notice described in Exhibit B of this License must be attached.

Exhibit A - Source Code Form License Notice

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

If it is not possible or desirable to put the notice in a particular file, then You may include the notice in a location (such as a LICENSE file in a relevant directory) where a recipient would be likely to look for such a notice.

You may add additional accurate notices of copyright ownership.

Exhibit B - "Incompatible With Secondary Licenses" Notice

This Source Code Form
is "Incompatible With Secondary Licenses", as
defined by the Mozilla Public License, v. 2.0.
Copyright 2005 Sun Microsystems, Inc. All rights reserved.
Use is subject to license terms.

***** BEGIN LICENSE BLOCK *****

Version: MPL 1.1/GPL 2.0/LGPL 2.1

The contents of this package are subject to the Mozilla Public License Version 1.1 (the "License"); you may not use this package except in compliance with the License. You may obtain a copy of the License at <http://www.mozilla.org/MPL/>

Software distributed under the License is distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License for the specific language governing rights and limitations under the License.

The Original Code is the Netscape Portable Runtime (NSPR).

The Initial Developer of the Original Code is
Netscape Communications Corporation.
Portions created by the Initial Developer are Copyright (C) 1998-2000
the Initial Developer. All Rights Reserved.

Contributor(s):

Alternatively, the contents of this file may be used under the terms of either the GNU General Public License Version 2 or later (the "GPL"), or the GNU Lesser General Public License Version 2.1 or later (the "LGPL"), in which case the provisions of the GPL or the LGPL are applicable instead of those above. If you wish to allow use of your version of this file only under the terms of either the GPL or the LGPL, and not to allow others to use your version of this file under the terms of the MPL, indicate your decision by deleting the provisions above and replace them with the notice

and other provisions required by the GPL or the LGPL. If you do not delete the provisions above, a recipient may use your version of this file under the terms of any one of the MPL, the GPL or the LGPL.

***** END LICENSE BLOCK *****

1.203 hwdata 0.233-7.9.el6

1.203.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the

notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt

otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made

generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF

MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

This data is licenced under 2 different licenses

- 1) GNU General Public License, version 2 or later
- 2) XFree86 1.0 license

This data can be used freely under either license.

1.204 tar 1.23-11.el6

1.204.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies

of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer

can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically

linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users'

Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention

is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to

copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install

modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or

- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a)

provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have

actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the

GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>
This program comes with
ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

1.205 curl 7.19.7-37.el6_4

1.205.1 Available under license :

COPYRIGHT AND PERMISSION NOTICE

Copyright (c) 1996 - 2009, Daniel Stenberg, <daniel@haxx.se>.

All rights reserved.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR

IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT OF THIRD PARTY RIGHTS. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of a copyright holder shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization of the copyright holder.

License Mixing with apps, libcurl and Third Party Libraries

=====

libcurl can be built to use a fair amount of various third party libraries, libraries that are written and provided by other parties that are distributed using their own licenses. Even libcurl itself contains code that may cause problems to some. This document attempts to describe what licenses libcurl and the other libraries use and what possible dilemmas linking and mixing them all can lead to for end users.

I am not a lawyer and this is not legal advice!

One common dilemma is that GPL[1]-licensed code is not allowed to be linked with code licensed under the Original BSD license (with the announcement clause). You may still build your own copies that use them all, but distributing them as binaries would be to violate the GPL license - unless you accompany your license with an exception[2]. This particular problem was addressed when the Modified BSD license was created, which does not have the announcement clause that collides with GPL.

libcurl <http://curl.haxx.se/docs/copyright.html>

Uses an MIT (or Modified BSD)-style license that is as liberal as possible. Some of the source files that deal with KRB4 have Original BSD-style announce-clause licenses. You may not distribute binaries with krb4-enabled libcurl that also link with GPL-licensed code!

OpenSSL <http://www.openssl.org/source/license.html>

(May be used for SSL/TLS support) Uses an Original BSD-style license with an announcement clause that makes it "incompatible" with GPL. You are not allowed to ship binaries that link with OpenSSL that includes GPL code (unless that specific GPL code includes an exception for OpenSSL - a habit that is growing more and more common). If OpenSSL's licensing is a problem for you, consider using GnuTLS or yassl instead.

GnuTLS <http://www.gnutls.org/>

(May be used for SSL/TLS support) Uses the LGPL[3] license. If this is a problem for you, consider using OpenSSL instead. Also note that GnuTLS itself depends on and uses other libs (libcrypt and libpgp-error) and they too are LGPL- or GPL-licensed.

yassl <http://www.yassl.com/>

(May be used for SSL/TLS support) Uses the GPL[1] license. If this is a problem for you, consider using OpenSSL or GnuTLS instead.

NSS <http://www.mozilla.org/projects/security/pki/nss/>

(May be used for SSL/TLS support) Is covered by the MPL[4] license, the GPL[1] license and the LGPL[3] license. You may choose to license the code under MPL terms, GPL terms, or LGPL terms. These licenses grant you different permissions and impose different obligations. You should select the license that best meets your needs.

c-ares <http://daniel.haxx.se/projects/c-ares/license.html>

(Used for asynchronous name resolves)

Uses an MIT license that is very

liberal and imposes no restrictions on any other library or part you may link with.

zlib http://www.gzip.org/zlib/zlib_license.html

(Used for compressed Transfer-Encoding support) Uses an MIT-style license that shouldn't collide with any other library.

krb4

While nothing in particular says that a Kerberos4 library must use any particular license, the one I've tried and used successfully so far (kth-krb4) is partly Original BSD-licensed with the announcement clause. Some of the code in libcurl that is written to deal with Kerberos4 is Modified BSD-licensed.

MIT Kerberos <http://web.mit.edu/kerberos/www/dist/>

(May be used for GSS support) MIT licensed, that shouldn't collide with any other parts.

Heimdal <http://www.pdc.kth.se/heimdal/>

(May be used for GSS support) Heimdal is Original BSD licensed with the announcement clause.

GNU GSS <http://www.gnu.org/software/gss/>

(May be used for GSS support) GNU GSS is GPL licensed. Note that you may not distribute binary curl packages that uses this if you build curl to also link and use any Original BSD licensed libraries!

fbopenssl

(Used for SPNEGO support) Unclear license. Based on its name, I assume that it uses the OpenSSL license and thus shares the same issues as described for OpenSSL above.

libidn <http://josefsson.org/libidn/>

(Used for IDNA support) Uses the GNU Lesser General Public License [3]. LGPL is a variation of GPL with slightly less aggressive "copyleft". This license requires more requirements to be met when distributing binaries, see the license for details. Also note that if you distribute a binary that includes this library, you must also include the full LGPL license text. Please properly point out what parts of the distributed package that the license addresses.

OpenLDAP

<http://www.openldap.org/software/release/license.html>

(Used for LDAP support) Uses a Modified BSD-style license. Since libcurl uses OpenLDAP as a shared library only, I have not heard of anyone that ships OpenLDAP linked with libcurl in an app.

libssh2 <http://www.libssh2.org/>

(Used for scp and sftp support) libssh2 uses a Modified BSD-style license.

[1] = GPL - GNU General Public License: <http://www.gnu.org/licenses/gpl.html>

[2] = <http://www.fsf.org/licenses/gpl-faq.html#GPLIncompatibleLibs> details on how to write such an exception to the GPL

[3] = LGPL - GNU Lesser General Public License:
<http://www.gnu.org/licenses/lgpl.html>

[4] = MPL - Mozilla Public License:
<http://www.mozilla.org/MPL/>

1.206 plymouth 0.8.3-27.el6.centos

1.206.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based

on it,
under Section 2) in object code or executable form under the terms of
Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING

WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
```

Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands `show w' and
`show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.207 iptables 1.4.7-9.el6

1.207.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to
using it. (Some other Free Software Foundation software is covered by
the GNU Library General Public License instead.) You can apply it to

your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed

under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this

License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not

excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free

Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the

library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.208 efibootmgr 0.5.4-10.el6

1.208.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission

to copy,
distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program
or other work which contains
a notice placed by the copyright holder saying it may be distributed
under the terms of this General Public License. The "Program", below,
refers to any such program or work, and a "work based on the Program"
means either the Program or any derivative work under copyright law:
that is to say, a work containing the Program or a portion of it,
either verbatim or with modifications and/or translated into another
language. (Hereinafter, translation is included without limitation in
the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not
covered by this License; they are outside its scope. The act of
running the Program is not restricted, and the output from the Program
is covered only if its contents constitute a work based on the
Program (independent of having been made by running the Program).
Whether that is true depends on what the Program does.

1. You may copy and distribute
verbatim copies of the Program's
source code as you receive it, in any medium, provided that you
conspicuously and appropriately publish on each copy an appropriate
copyright notice and disclaimer of warranty; keep intact all the
notices that refer to this License and to the absence of any warranty;
and give any other recipients of the Program a copy of this License
along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under

the scope of this License.

3. You may copy and distribute the Program

(or a work based on it,

under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under

this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing

to distribute
software through any other system and a licensee cannot
impose that choice.

This section is intended to make thoroughly clear what is believed to
be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in
certain countries either by patents or by copyrighted interfaces, the
original copyright holder who places the Program under this License
may add an explicit geographical distribution limitation excluding
those countries, so that distribution is permitted only in or among
countries not thus excluded. In such case, this License incorporates
the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions
of the General Public License from time to time. Such new versions will
be similar in spirit to the present version, but may differ in detail to
address new problems or concerns.

Each version is given a distinguishing version number. If the Program
specifies
a version number of this License which applies to it and "any
later version", you have the option of following the terms and conditions
either of that version or of any later version published by the Free
Software Foundation. If the Program does not specify a version number of
this License, you may choose any version ever published by the Free Software
Foundation.

10. If you wish to incorporate parts of the Program into other free
programs whose distribution conditions are different, write to the author
to ask for permission. For software which is copyrighted by the Free
Software Foundation, write to the Free Software Foundation; we sometimes
make exceptions for this. Our decision will be guided by the two goals
of preserving the free status of all derivatives of our free software and
of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY
FOR THE PROGRAM, TO THE EXTENT PERMITTED
BY APPLICABLE LAW. EXCEPT WHEN
OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES
PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED
OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF
MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS
TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE
PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING,

REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS),

EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version

2 of the License, or

(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this

when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands

`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.209 dracut 004-303.el6

1.209.1 Available under license :

This package was debianized by Philippe Seewer <philippe.seewer@bfh.ch> on
Fri Nov 20 15:45:00 +0100

Sources can be downloaded from:

<https://sourceforge.net/projects/dracut/>

Upstream Maintainer:

Harald Hoyer <harald@redhat.com>

Upstream Authors:

Victor Lowther <victor.lowther@gmail.com>

Warren Togami <wtogami@redhat.com>

Jeremy Katz <katzj@redhat.com>

Philippe Seewer <philippe.seewer@bfh.ch>

David Dillow <dave@thedillows.org>
Andreas Thienemann <andreas@bawue.net>
Hans de Goede <hdegoede@redhat.com>
Marc Grimme <grimme@atix.de>
Bill Nottingham <notting@redhat.com>
Daniel Drake <dsd@laptop.org>
Lance Albertson <lance@osuosl.org>
Michael Ploujnikov <plouj@somanetworks.com>
Peter Jones <pjones@redhat.com>
Dave Jones <davej@redhat.com>
Michal Schmidt <mschmidt@redhat.com>
Peter Rajnoha <prajnoha@redhat.com>
Quentin Armitage <quentin@armitage.org.uk>
Sergey Fionov <fionov@gmail.com>
Thilo Bangert <thilo.bangert@gmx.net>

Copyright:

Copyright 2009 Harald Hoyer <harald@redhat.com>

License: GPLv2

On Debian systems, the complete text of the GNU General Public License version 2 can be found in `~/usr/share/common-licenses/GPL-2`.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for

this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in

the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.
- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program,

and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include

anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free

redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free

programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify

it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.210 libyami 0.1.3-1.el6

1.210.1 Available under license :

Copyright (c) 2017-2020 Ingy dt Net
Copyright (c) 2006-2016 Kirill Simonov

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.211 centos-release 6-3.el6.centos.9

1.211.1 Available under license :

CentOS-6 EULA

CentOS-6 comes with no guarantees or warranties of any sorts, either written or implied.

The Distribution is released as GPL. Individual packages in the distribution come with their own licences.

The following copyright applies to the Red Hat Enterprise Linux compilation and any portions of Red Hat Enterprise Linux it does not conflict with. Whenever this policy does conflict with the copyright of any individual portion of Red Hat Enterprise Linux, it does not apply.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities

other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections

1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it.

However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and

all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License

may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER

PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be

mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.212 gdbm 1.8.0-36.el6

1.212.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
675 Mass Ave, Cambridge, MA 02139, USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably

considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary

form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then

the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free

Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version 2 of
```

the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show
c'` should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than ``show w'` and ``show c'`; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.213 kbd 1.15-11.el6

1.213.1 Available under license :

The file
kbrate.c
is Copyright (C) 1992 Rickard E. Faith.

The files
dumpkeys.c loadkeys.y analyze.l ksyms.c ksyms.h
showkey.c keymaps.5 loadkeys.1 dumpkeys.1 showkey.1
are Copyright (C) 1993 Risto Kankkunen.

The files
setfont.c setfont.8 mapscrn.c mapscrn.8
(and changes to loadkeys.y)
are Copyright (C) 1993 Eugene G. Crosser.

The files
psfaddtable.1 psfgettable.1 psfstrietable.1
are Copyright (C) 1994 H. Peter Anvin.

The files
chvt.c clrunicmap.c deallovcvt.c fgconsole.c findfile.c
getfd.c getkeycodes.c getunicmap.c kbd_mode.c loadunicmap.c
psffontop.c psfxtable.c resizecons.c screendump.c setkeycodes.c
setleds.c setmetamode.c setvesablank.c showconsolefont.c
spawn_console.c spawn_login.c
chvt.1 deallovcvt.1 kbd_mode.1 setleds.1 setmetamode.1
getkeycodes.8 loadunicmap.8 resizecons.8 setkeycodes.8
kbd.FAQ.*
(and changes to earlier mentioned programs)
are Copyright (C) 1994-1999 Andries E. Brouwer.

All files in this package may be freely copied under the terms
of the GNU General
Public License (GPL), version 2, or at your
option any later version - except possibly for the restrictions
mentioned in the directory consolefonts.

1.214 trousers 0.3.4-4.el6

1.214.1 Available under license :

THE ACCOMPANYING PROGRAM IS PROVIDED UNDER THE TERMS OF THIS COMMON PUBLIC LICENSE ("AGREEMENT"). ANY USE, REPRODUCTION OR DISTRIBUTION OF THE PROGRAM CONSTITUTES RECIPIENT'S ACCEPTANCE OF THIS AGREEMENT.

1. DEFINITIONS

"Contribution" means:

- a) in the case of the initial Contributor, the initial code and documentation distributed under this Agreement, and
- b) in the case of each subsequent Contributor:
 - i) changes to the Program, and
 - ii) additions to the Program;

where such changes and/or additions to the Program originate from and are distributed by that particular Contributor. A Contribution 'originates' from a Contributor if it was added to the Program by such Contributor itself or anyone acting on such Contributor's behalf. Contributions do not include additions to the Program which: (i) are separate modules of software distributed in conjunction with the Program under their own license agreement, and (ii) are not derivative works of the Program.

"Contributor"

means any person or entity that distributes the Program.

"Licensed Patents " mean patent claims licensable by a Contributor which are necessarily infringed by the use or sale of its Contribution alone or when combined with the Program.

"Program" means the Contributions distributed in accordance with this Agreement.

"Recipient" means anyone who receives the Program under this Agreement, including all Contributors.

2. GRANT OF RIGHTS

a) Subject to the terms of this Agreement, each Contributor hereby grants Recipient a non-exclusive, worldwide, royalty-free copyright license to reproduce, prepare derivative works of, publicly display, publicly perform, distribute and sublicense the Contribution of such Contributor, if any, and such derivative works, in source code and object code form.

b) Subject to the terms of this Agreement, each Contributor hereby grants Recipient a non-exclusive, worldwide, royalty-free patent license under Licensed Patents to make, use, sell, offer to sell, import and otherwise transfer the Contribution of such Contributor, if any, in source code and object code form. This patent license shall apply to the combination of the Contribution and the Program if, at the time the Contribution is added by the Contributor, such addition of the Contribution causes such combination to be covered by the Licensed Patents. The patent license shall not apply to any other combinations which include the Contribution. No hardware per se is licensed hereunder.

c) Recipient understands that although each Contributor grants the licenses to its Contributions set forth herein, no assurances are provided by any Contributor that the Program does not infringe the patent or other intellectual property rights of any other entity. Each Contributor disclaims any liability to Recipient for claims brought by any other entity based on infringement of intellectual property rights or otherwise. As a condition to exercising the rights and licenses granted hereunder,

each Recipient hereby assumes sole responsibility to secure any other intellectual property rights needed, if any. For example, if a third party patent license is required to allow Recipient to distribute the Program, it is Recipient's

responsibility to acquire that license before distributing the Program.

d) Each Contributor represents that to its knowledge it has sufficient copyright rights in its Contribution, if any, to grant the copyright license set forth in this Agreement.

3. REQUIREMENTS

A Contributor may choose to distribute the Program in object code form under its own license agreement, provided that:

a) it complies with the terms and conditions of this Agreement; and

b) its license agreement:

i) effectively disclaims on behalf of all Contributors all warranties and conditions, express and implied, including warranties or conditions of title and non-infringement, and implied warranties or conditions of merchantability and fitness for a particular purpose;

ii) effectively excludes on behalf of all Contributors all liability for damages, including direct, indirect, special, incidental and consequential damages, such as lost profits;

iii) states that any provisions which differ from this Agreement are offered by that Contributor alone and not by any other party; and

iv) states that source code for the Program is available from such Contributor, and informs licensees how to obtain it in a reasonable manner on or through a medium customarily used for software exchange.

When the Program is made available in source code form:

a) it must be made available under this Agreement; and

b) a copy of this Agreement must be included with each copy of the Program.

Contributors may not remove or alter any copyright notices contained within the Program.

Each Contributor must identify itself as the originator of its Contribution, if any, in a manner that reasonably allows subsequent Recipients to identify the originator of the Contribution.

4. COMMERCIAL DISTRIBUTION

Commercial distributors of software may accept certain responsibilities with respect to end users, business partners and the like. While this license is intended to facilitate the commercial use of the Program, the Contributor who includes the Program in a commercial product offering should do so in a manner which does not create potential liability for other Contributors. Therefore, if a Contributor includes the Program in a commercial product offering, such Contributor ("Commercial Contributor") hereby agrees to defend and indemnify every other Contributor ("Indemnified Contributor") against any losses, damages and costs (collectively "Losses") arising from claims,

lawsuits and other legal actions brought by a third party against the Indemnified Contributor to the extent caused by the acts or omissions of such Commercial Contributor in connection with its distribution of the Program in a commercial product offering. The obligations

in this section do not apply to any claims or Losses relating to any actual or alleged intellectual property infringement. In order to qualify, an Indemnified Contributor must: a) promptly notify the Commercial Contributor in writing of such claim, and b) allow the Commercial Contributor to control, and cooperate with the Commercial Contributor in, the defense and any related settlement negotiations. The Indemnified Contributor may participate in any such claim at its own expense.

For example, a Contributor might include the Program in a commercial product offering, Product X. That Contributor is then a Commercial Contributor. If that Commercial Contributor then makes performance claims, or offers warranties related to Product X, those performance claims and warranties are such Commercial Contributor's responsibility alone. Under this section, the Commercial Contributor would have to defend claims against the other Contributors related to those performance claims and warranties, and if a court requires any other Contributor to pay any damages as a result, the Commercial Contributor must pay those damages.

5. NO WARRANTY

EXCEPT AS EXPRESSLY SET FORTH IN THIS AGREEMENT, THE PROGRAM IS PROVIDED ON AN "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, EITHER EXPRESS OR IMPLIED INCLUDING, WITHOUT LIMITATION, ANY WARRANTIES OR CONDITIONS OF TITLE, NON-INFRINGEMENT, MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. Each Recipient is solely responsible for determining the appropriateness of using and distributing the Program and assumes all risks associated with its exercise of rights under this Agreement, including but not limited to the risks and costs of program errors, compliance with applicable laws, damage to or loss of data, programs or equipment, and unavailability or interruption of operations.

6. DISCLAIMER OF LIABILITY

EXCEPT AS EXPRESSLY SET FORTH IN THIS AGREEMENT, NEITHER RECIPIENT NOR ANY CONTRIBUTORS SHALL HAVE ANY LIABILITY FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING WITHOUT LIMITATION LOST PROFITS), HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OR DISTRIBUTION OF THE PROGRAM OR THE EXERCISE OF ANY RIGHTS GRANTED HEREUNDER, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

7. GENERAL

If any provision of this Agreement is invalid or unenforceable under applicable law, it shall not affect the validity or enforceability of the remainder of the terms of this Agreement, and without further action by the parties hereto, such provision shall be reformed to the minimum extent necessary to make such provision valid and enforceable.

If Recipient institutes patent litigation against a Contributor with respect to a patent applicable to software (including a cross-claim or counterclaim in a lawsuit), then any patent licenses granted by that Contributor to such Recipient under this Agreement shall terminate as of the date such litigation is filed. In addition, if Recipient institutes patent litigation against any entity (including a cross-claim or counterclaim in a lawsuit) alleging that the

Program itself (excluding combinations of the Program with other software or hardware) infringes such Recipient's patent(s), then such Recipient's rights granted under Section 2(b) shall terminate as of the date such litigation is filed.

All Recipient's rights under this Agreement shall terminate if it fails to comply with any of the material terms or conditions of this Agreement and does not cure such failure in a reasonable period of time after becoming aware of such noncompliance. If all Recipient's rights under this Agreement terminate, Recipient agrees to cease use and distribution of the Program as soon as reasonably practicable. However, Recipient's obligations under this Agreement and any licenses granted by Recipient relating to the Program shall continue and survive.

Everyone is permitted to copy and distribute copies of this Agreement, but in order to avoid inconsistency the Agreement is copyrighted and may only be modified in the following manner. The Agreement Steward reserves the right to publish new versions (including revisions) of this Agreement from time to time. No one other than the Agreement Steward has the right to modify this Agreement. IBM is the initial Agreement Steward. IBM may assign the responsibility to serve as the Agreement Steward to a suitable separate entity. Each new version of the Agreement will be given a distinguishing version number. The Program (including Contributions) may always be distributed subject to the version of the Agreement under which it was received. In addition, after a new version of the Agreement is published, Contributor may elect to distribute the Program (including its Contributions) under the new version. Except as expressly stated in Sections 2(a) and 2(b) above, Recipient receives no rights or licenses to the intellectual property of any Contributor under this Agreement, whether expressly, by implication, estoppel or otherwise. All rights in the Program not expressly granted under this Agreement are reserved.

This Agreement is governed by the laws of the State of New York and the intellectual property laws of the United States of America. No party to this Agreement will bring a legal action under this Agreement more than one year after the cause of action arose. Each party waives its rights to a jury trial in any resulting litigation.

1.215 shadow-utils 4.1.4.2-13.el6

1.215.1 Available under license :

NOTE:

This license has been obsoleted by the change to the BSD-style copyright.
You may continue to use this license if you wish, but you are under no obligation to do so.

(*

This document is freely plagiarised from the 'Artistic Licence', distributed as part of the Perl v4.0 kit by Larry Wall, which is available from most major archive sites. I stole it from CrackLib.

\$Id: COPYING 1342 2007-11-10 23:46:11Z nekral-guest \$

*)

This documents purpose is to state the conditions under which this Package (See definition below) viz: "Shadow", the Shadow Password Suite which is held by Julianne Frances Haugh, may be copied, such that the

copyright holder maintains some semblance of artistic control over the development of the package, while giving the users of the package the right to use and distribute the Package in a more-or-less customary fashion, plus the right to make reasonable modifications.

So there.

Definitions:

A

"Package" refers to the collection of files distributed by the Copyright Holder, and derivatives of that collection of files created through textual modification, or segments thereof.

"Standard Version" refers to such a Package if it has not been modified, or has been modified in accordance with the wishes of the Copyright Holder.

"Copyright Holder" is whoever is named in the copyright or copyrights for the package.

"You" is you, if you're thinking about copying or distributing this Package.

"Reasonable copying fee" is whatever you can justify on the basis of media cost, duplication charges, time of people involved, and so on. (You will not be required to justify it to the Copyright Holder, but only to the computing community at large as a market that must bear the fee.)

"Freely Available" means that no fee is charged for the item itself, though there may be fees involved in handling the item. It also means that recipients of the item may redistribute it under the same conditions they received it.

1. You may make and give away verbatim copies of the source form of the Standard Version of this Package without restriction, provided that you duplicate all of the original copyright notices and associated disclaimers.

2. You may apply bug fixes, portability fixes and other modifications derived from the Public Domain or from the Copyright Holder. A Package modified in such a way shall still be considered the Standard Version.

3. You may otherwise modify your copy of this Package in any way, provided that you insert a prominent notice in each changed file stating how and when AND WHY you changed that file, and provided that you do at least ONE of the following:

a) place your modifications in the Public Domain or otherwise make them Freely Available, such as by posting said modifications to Usenet or an equivalent medium, or placing the modifications on a major archive site such as uunet.uu.net, or by allowing the Copyright Holder to include your modifications in the Standard Version of the Package.

b) use the modified Package only within your corporation or organization.

c) rename any non-standard executables so the names do not conflict with standard executables, which must also be provided, and provide separate documentation for each non-standard executable that clearly documents how it differs from the Standard Version.

d) make other distribution arrangements with the Copyright Holder.

4. You may distribute the programs of this Package in object code or executable form, provided that you do at least ONE of the following:

a) distribute a Standard Version of the executables and library files, together with instructions (in the manual page or equivalent) on where to get the Standard Version.

b) accompany the distribution with the machine-readable source of the Package with your modifications.

c) accompany any non-standard executables with their corresponding Standard Version executables, giving the non-standard executables non-standard names, and clearly documenting the differences in manual pages (or equivalent), together with instructions on where to get the Standard Version.

d) make other distribution arrangements with the Copyright Holder.

5. You may charge a reasonable copying fee for any distribution of this Package. You may charge any fee you choose for support of this Package. **YOU MAY NOT CHARGE A FEE FOR THIS PACKAGE ITSELF.** However, you may distribute this Package in aggregate with other (possibly commercial) programs as part of a larger (possibly commercial) software distribution provided that **YOU DO NOT ADVERTISE** this package as a product of your own.

6. The name of the Copyright Holder may not be used to endorse or promote products derived from this software without specific prior written permission.

7. THIS PACKAGE IS PROVIDED "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

The End

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their

rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate

copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program

except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is

implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED

OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

1.216 psmisc 22.6-15.el6_0.1

1.216.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can

be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary

form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then

the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free

Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version
```


2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this
when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands
`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.217 coreutils 8.4-19.el6_4.2

1.217.1 Available under license :

@c The GNU Free Documentation License.

@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,

@c hence no sectioning command or @node.

@display

Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.

@uref{<http://fsf.org/>}

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other
functional and useful document @dfn{free} in the sense of freedom: to
assure everyone the effective freedom to copy and redistribute it,
with or without modifying it, either commercially or noncommercially.
Secondarily, this License preserves for the author and publisher a way
to get credit for their work, while not being considered responsible
for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative
works of the document
must themselves be free in the same sense. It
complements the GNU General Public License, which is a copyleft
license designed for free software.

We have designed this License in order to use it for manuals for free
software, because free software needs free documentation: a free
program should come with manuals providing the same freedoms that the
software does. But this License is not limited to software manuals;
it can be used for any textual work, regardless of subject matter or
whether it is published as a printed book. We recommend this License
principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that

contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The ``Document'', below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as ``you''. You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A ``Modified Version'' of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A ``Secondary Section'' is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The ``Invariant Sections'' are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The ``Cover Texts'' are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A ``Transparent'' copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file

format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not ``Transparent" is called ``Opaque".

Examples of suitable formats for Transparent copies include plain @sc{ascii} without markup, Texinfo input format, La@TeX{} input format, @acronym{SGML} or @acronym{XML} using a publicly available @acronym{DTD}, and standard-conforming simple @acronym{HTML}, PostScript or @acronym{PDF} designed for human modification. Examples of transparent image formats include @acronym{PNG}, @acronym{XCF} and @acronym{JPG}. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, @acronym{SGML} or @acronym{XML} for which the @acronym{DTD} and/or processing tools are not generally available, and the machine-generated @acronym{HTML}, PostScript or @acronym{PDF} produced by some word processors for output purposes only.

The ``Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, ``Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The ``publisher" means any person or entity that distributes copies of the Document to the public.

A section ``Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as ``Acknowledgements", ``Dedications", ``Endorsements", or ``History".) To ``Preserve the Title" of such a section when you modify the Document means that it remains a section ``Entitled XYZ" according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever

to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible.

You may add other material on the covers in addition.

Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material.

If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that

this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that

edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in

the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements'' or ``Dedications'', Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements''. Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements'' or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document,

you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant Sections in the Modified Version's license notice. These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements'', provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original

author or publisher of that section if known, or else a unique number.

Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History" in the various original documents, forming one section Entitled ``History"; likewise combine any sections Entitled ``Acknowledgements", and any sections Entitled ``Dedications". You must delete all sections Entitled ``Endorsements."

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract

a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an ``aggregate" if the copyright resulting from the compilation is not used to limit the legal rights of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form. Otherwise they must appear on printed covers that bracket the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See [@uref{http://www.gnu.org/copyleft/}](http://www.gnu.org/copyleft/).

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License ``or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

``Massive Multiauthor Collaboration Site" (or ``MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A ``Massive Multiauthor Collaboration" (or ``MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

``CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

``Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is ``eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole

or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

@smallexample

@group

Copyright (C) @var{year} @var{your name}.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled ``GNU Free Documentation License''.

@end group

@end smallexample

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the ``with@dots{ }Texts." line with this:

@smallexample

@group

with the Invariant Sections being @var{list their titles}, with the Front-Cover

Texts being @var{list}, and with the Back-Cover Texts

being @var{list}.

@end group

@end smallexample

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License,

to permit their use in free software.

@c Local Variables:

@c ispell-local-pdict: "ispell-dict"

@c End:

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the

earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed;

section 10

makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This

License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the

written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object

code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above

requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible

for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a

patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <<http://www.gnu.org/licenses/>>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>
```

```
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
```

```
This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

1.218 nspr 4.9.5-2.el6_4

1.218.1 Available under license :

Copyright 2005 Sun Microsystems, Inc. All rights reserved.

Use is subject to license terms.

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

Mozilla Public License Version 2.0

=====

1. Definitions

1.1. "Contributor"

means each individual or legal entity that creates, contributes to the creation of, or owns Covered Software.

1.2. "Contributor Version"

means the combination of the Contributions of others (if any) used by a Contributor and that particular Contributor's Contribution.

1.3. "Contribution"

means Covered Software of a particular Contributor.

1.4. "Covered Software"

means Source Code Form to which the initial Contributor has attached the notice in Exhibit A, the Executable Form of such Source Code Form, and Modifications of such Source Code Form, in each case including portions thereof.

1.5. "Incompatible With Secondary Licenses"

means

(a) that the initial Contributor has attached the notice described in Exhibit B to the Covered Software; or

(b) that the Covered Software was made available under the terms of

version 1.1 or earlier of the License, but not also under the terms of a Secondary License.

1.6. "Executable Form"

means any form of the work other than Source Code Form.

1.7. "Larger Work"

means a work that combines Covered Software with other material, in a separate file or files, that is not Covered Software.

1.8. "License"

means this document.

1.9. "Licensable"

means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently, any and all of the rights conveyed by this License.

1.10. "Modifications"

means any of the following:

(a) any file in Source Code Form that results from an addition to, deletion from, or modification of the contents of Covered Software; or

(b) any new file in Source Code Form that contains any Covered Software.

1.11. "Patent Claims" of a Contributor

means any patent claim(s), including without limitation, method, process, and apparatus claims, in any patent Licensable by such Contributor that would be infringed, but for the grant of the License, by the making, using, selling, offering for sale, having made, import, or transfer of either its Contributions or its Contributor Version.

1.12. "Secondary License"

means either the GNU General Public License, Version 2.0, the GNU Lesser General Public License, Version 2.1, the GNU Affero General Public License, Version 3.0, or any later versions of those licenses.

1.13. "Source Code Form"

means the form of the work preferred for making modifications.

1.14. "You" (or "Your")

means an individual or a legal entity exercising rights under this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. License Grants and Conditions

2.1. Grants

Each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license:

- (a) under intellectual property rights (other than patent or trademark) Licensable by such Contributor to use, reproduce, make available, modify, display, perform, distribute, and otherwise exploit its Contributions, either on an unmodified basis, with Modifications, or as part of a Larger Work; and
- (b) under Patent Claims of such Contributor to make, use, sell, offer for sale, have made, import, and otherwise transfer either its Contributions or its Contributor Version.

2.2. Effective Date

The licenses granted in Section 2.1 with respect to any Contribution become effective for each Contribution on the date the Contributor first distributes such Contribution.

2.3. Limitations on Grant Scope

The licenses granted in this Section 2 are the only rights granted under this License. No additional rights or licenses will be implied from the distribution or licensing of Covered Software under this License. Notwithstanding Section 2.1(b) above, no patent license is granted by a Contributor:

- (a) for any code that a Contributor has removed from Covered Software; or
- (b) for infringements caused by: (i) Your and any other third party's modifications of Covered Software, or (ii) the combination of its Contributions with other software (except as part of its Contributor Version); or
- (c) under Patent Claims infringed by Covered Software in the absence of its Contributions.

This License does not grant any rights in the trademarks, service marks, or logos of any Contributor (except as may be necessary to comply with the notice requirements in Section 3.4).

2.4. Subsequent Licenses

No Contributor makes

additional grants as a result of Your choice to distribute the Covered Software under a subsequent version of this License (see Section 10.2) or under the terms of a Secondary License (if permitted under the terms of Section 3.3).

2.5. Representation

Each Contributor represents that the Contributor believes its Contributions are its original creation(s) or it has sufficient rights to grant the rights to its Contributions conveyed by this License.

2.6. Fair Use

This License is not intended to limit any rights You have under applicable copyright doctrines of fair use, fair dealing, or other equivalents.

2.7. Conditions

Sections 3.1, 3.2, 3.3, and 3.4 are conditions of the licenses granted in Section 2.1.

3. Responsibilities

3.1. Distribution of Source Form

All distribution of Covered Software in Source Code Form, including any Modifications that You create or to which You contribute, must be under the terms of this License. You must inform recipients that the Source Code Form of the Covered Software is governed by the terms of this License, and how they can obtain a copy of this License. You may not attempt to alter or restrict the recipients' rights in the Source Code Form.

3.2. Distribution of Executable Form

If You distribute Covered Software in Executable Form then:

(a) such Covered Software must also be made available in Source Code Form, as described in Section 3.1, and You must inform recipients of the Executable Form how they can obtain a copy of such Source Code Form by reasonable means in a timely manner, at a charge no more than the cost of distribution to the recipient; and

(b) You may distribute such Executable Form under the terms of this License, or sublicense it under different terms, provided that the

license for the Executable Form does not attempt to limit or alter the recipients' rights in the Source Code Form under this License.

3.3. Distribution of a Larger Work

You may create and distribute a Larger Work under terms of Your choice, provided that You also comply with the requirements of this License for the Covered Software. If the Larger Work is a combination of Covered Software with a work governed by one or more Secondary Licenses, and the Covered Software is not Incompatible With Secondary Licenses, this License permits You to additionally distribute such Covered Software under the terms of such Secondary License(s), so that the recipient of the Larger Work may, at their option, further distribute the Covered Software under the terms of either this License or such Secondary License(s).

3.4. Notices

You may not remove or alter the substance of any license notices (including copyright notices, patent notices, disclaimers of warranty, or limitations of liability) contained within the Source Code Form of the Covered Software, except that You may alter any license notices to the extent required to remedy known factual inaccuracies.

3.5. Application of Additional Terms

You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Software. However, You may do so only on Your own behalf, and not on behalf of any Contributor. You must make it absolutely clear that any such warranty, support, indemnity, or liability obligation is offered by You alone, and You hereby agree to indemnify every Contributor for any liability incurred by such Contributor as a result of warranty, support, indemnity or liability terms You offer. You may include additional disclaimers of warranty and limitations of liability specific to any jurisdiction.

4. Inability to Comply Due to Statute or Regulation

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Software due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must

be placed in a text file included with all distributions of the Covered Software under this License. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Termination

5.1. The rights granted under this License will terminate automatically if You fail to comply with any of its terms. However, if You become compliant, then the rights granted under this License from a particular Contributor are reinstated (a) provisionally, unless and until such Contributor explicitly and finally terminates Your grants, and (b) on an ongoing basis, if such Contributor fails to notify You of the non-compliance by some reasonable means prior to 60 days after You have come back into compliance. Moreover, Your grants from a particular Contributor are reinstated on an ongoing basis if such Contributor notifies You of the non-compliance by some reasonable means, this is the first time You have received notice of non-compliance with this License from such Contributor, and You become compliant prior to 30 days after Your receipt of the notice.

5.2. If You initiate litigation against any entity by asserting a patent infringement claim (excluding declaratory judgment actions, counter-claims, and cross-claims) alleging that a Contributor Version directly or indirectly infringes any patent, then the rights granted to You by any and all Contributors for the Covered Software under Section 2.1 of this License shall terminate.

5.3. In the event of termination under Sections 5.1 or 5.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or Your distributors under this License prior to termination shall survive termination.

*

*

* 6. Disclaimer of Warranty

*

* -----

*

*

*

* Covered Software is provided under this License on an "as is" *

* basis, without warranty of any kind, either expressed, implied, or *

* statutory, including, without limitation, warranties that the *

* Covered Software is free of defects, merchantable, fit for a *

* particular purpose or non-infringing. The entire risk as to the *

* quality and performance of the Covered Software is with You. *

* Should any Covered Software prove defective in any respect, You *

* (not any Contributor) assume the cost of any necessary servicing, *
 * repair, or correction. This disclaimer of warranty constitutes an *
 * essential part of this License. No use of any Covered
 Software is *
 * authorized under this License except under this disclaimer. *

* 7. Limitation of Liability *

* ----- *

* Under no circumstances and under no legal theory, whether tort *
 * (including negligence), contract, or otherwise, shall any *
 * Contributor, or anyone who distributes Covered Software as *
 * permitted above, be liable to You for any direct, indirect, *
 * special, incidental, or consequential damages of any character *
 * including, without limitation,
 damages for lost profits, loss of *
 * goodwill, work stoppage, computer failure or malfunction, or any *
 * and all other commercial damages or losses, even if such party *
 * shall have been informed of the possibility of such damages. This *
 * limitation of liability shall not apply to liability for death or *
 * personal injury resulting from such party's negligence to the *
 * extent applicable law prohibits such limitation. Some *
 * jurisdictions do not allow the exclusion or limitation of *
 * incidental or consequential damages, so this exclusion and *
 * limitation may not apply to You. *

8. Litigation

Any litigation relating to this License may be brought only in the
 courts of a jurisdiction where the defendant maintains its principal
 place
 of business and such litigation shall be governed by laws of that
 jurisdiction, without reference to its conflict-of-law provisions.
 Nothing in this Section shall prevent a party's ability to bring
 cross-claims or counter-claims.

9. Miscellaneous

This License represents the complete agreement concerning the subject
 matter hereof. If any provision of this License is held to be

unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not be used to construe this License against a Contributor.

10. Versions of the License

10.1. New Versions

Mozilla Foundation is the license steward. Except as provided in Section 10.3, no one other than the license steward has the right to modify or publish new versions of this License. Each version will be given a distinguishing version number.

10.2. Effect of New Versions

You may distribute the Covered Software under the terms of the version of the License under which You originally received the Covered Software, or under the terms of any subsequent version published by the license steward.

10.3. Modified Versions

If you create software not governed by this License, and you want to create a new license for such software, you may create and use a modified version of this License if you rename the license and remove any references to the name of the license steward (except to note that such modified license differs from this License).

10.4. Distributing Source Code Form that is Incompatible With Secondary Licenses

If You choose to distribute Source Code Form that is Incompatible With Secondary Licenses under the terms of this version of the License, the notice described in Exhibit B of this License must be attached.

Exhibit A - Source Code Form License Notice

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

If it is not possible or desirable to put the notice in a particular file, then You may include the notice in a location (such as a LICENSE

file in a relevant directory) where a recipient would be likely to look for such a notice.

You may add additional accurate notices of copyright ownership.

Exhibit B - "Incompatible With Secondary Licenses" Notice

This Source Code Form is "Incompatible With Secondary Licenses", as defined by the Mozilla Public License, v. 2.0.

1.219 pciutils 3.1.10-2.el6

1.219.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not

compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY

FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,

or

(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.220 libsemanage-common 2.0.43-4.2.el6

1.220.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know

that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in

non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for

writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in

themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not

compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one

of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally

accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute

so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and

"any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the

ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

```
<signature of Ty Coon>, 1 April 1990  
Ty Coon, President of Vice
```

That's all there is to it!

1.221 dbus-glib 0.86-6.el6

1.221.1 Available under license :

The D-Bus glib bindings are licensed to you under your choice of the Academic Free License version 2.1, or the GNU General Public License version 2. Both licenses are included here. Some of the standalone binaries are under the GPL only; in particular, but not limited to, tests/decode-gcov.c. Each source code

file is marked with the proper copyright information.

The Academic Free License

v. 2.1

This Academic Free License (the "License") applies to any original work of authorship (the "Original Work") whose owner (the "Licensor") has placed the following notice immediately following the copyright notice for the Original Work:

Licensed under the Academic Free License version 2.1

1) Grant of Copyright License. Licensor hereby grants You a world-wide, royalty-free, non-exclusive, perpetual, sublicenseable license to do the following:

- a) to reproduce the Original Work in copies;
- b) to prepare derivative works ("Derivative Works") based upon the Original Work;
- c) to distribute copies of the Original Work and Derivative Works to the public;
- d) to perform the Original Work publicly; and
- e) to display the Original Work publicly.

2) Grant of Patent License. Licensor hereby grants You a world-wide, royalty-free, non-exclusive, perpetual, sublicenseable license, under patent claims owned or controlled by the Licensor that are embodied in the Original Work as furnished by the Licensor, to make, use, sell and offer for sale the Original Work and Derivative Works.

3) Grant of Source Code License. The term "Source Code" means the preferred form of the Original Work for making modifications to it and all available documentation describing how to modify the Original Work. Licensor hereby agrees to provide a machine-readable copy of the Source Code of the Original Work along with each copy of the Original Work that Licensor distributes. Licensor reserves the right to satisfy this obligation by placing a machine-readable copy of the Source Code in an information repository reasonably calculated to permit inexpensive and convenient access by You for as long as Licensor continues to distribute the Original Work, and by publishing the address of that information repository in a notice immediately following the copyright notice that applies to the Original Work.

4) Exclusions From License Grant. Neither the names of Licensor, nor the names of any contributors to the Original Work, nor any of their trademarks or service marks, may be used to endorse or promote products derived from this Original Work without express prior written permission of the Licensor. Nothing in this License shall be deemed to grant any rights to trademarks, copyrights, patents, trade secrets or any other intellectual property of Licensor except as expressly stated herein. No patent license is granted to make, use, sell or offer to sell embodiments of any patent claims other than the licensed claims defined in Section 2. No right is granted to the trademarks of Licensor even if such marks are included in the Original Work. Nothing in this License shall be interpreted to prohibit Licensor from licensing under different terms from this License any Original Work that Licensor otherwise would have a right to license.

5) This section intentionally omitted.

6) Attribution Rights. You must retain, in the Source Code of any Derivative Works that You create, all copyright, patent or trademark notices from the Source Code of the Original Work, as well as any notices of licensing and any descriptive text identified therein as an "Attribution Notice." You must cause the Source Code for any Derivative Works that You create to carry a prominent Attribution Notice reasonably calculated to inform recipients that You have modified the Original Work.

7) Warranty of Provenance and Disclaimer of Warranty. Licensor warrants that the copyright in and to the Original Work and the patent rights granted herein by Licensor are owned by the Licensor or are sublicensed to You under the terms of this License with the permission of the contributor(s) of those copyrights and patent rights. Except as expressly stated in the immediately preceding sentence, the Original Work is provided under this License on an "AS IS" BASIS and WITHOUT WARRANTY, either express or implied, including, without limitation, the warranties of NON-INFRINGEMENT, MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY OF THE ORIGINAL WORK IS WITH YOU. This DISCLAIMER OF WARRANTY constitutes an essential part of this License. No license to Original Work is granted hereunder except under this disclaimer.

8) Limitation of Liability. Under no circumstances and under no legal theory, whether in tort (including negligence), contract, or otherwise, shall the Licensor be liable to any person for any direct, indirect, special, incidental, or consequential damages of any character arising as a result of this License or the use of the Original Work including, without limitation,

damages for loss of goodwill, work stoppage, computer failure or malfunction, or any and all other commercial damages or losses. This limitation of liability shall not apply to liability for death or personal injury resulting from Licensor's negligence to the extent applicable law prohibits such limitation. Some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, so this exclusion and limitation may not apply to You.

9) Acceptance and Termination. If You distribute copies of the Original Work or a Derivative Work, You must make a reasonable effort under the circumstances to obtain the express assent of recipients to the terms of this License. Nothing else but this License (or another written agreement between Licensor and You) grants You permission to create Derivative Works based upon the Original Work or to exercise any of the rights granted in Section 1 herein, and any attempt to do so except under the terms of this License (or another written agreement between Licensor and You) is expressly prohibited by U.S. copyright law, the equivalent laws of other countries, and by international treaty. Therefore, by exercising any of the rights granted to You in Section 1 herein, You indicate Your acceptance of this License and all of its terms and conditions.

10) Termination for Patent Action. This License shall terminate automatically and You may no longer exercise any of the rights granted to You by this License as of the date You commence an action, including a cross-claim or counterclaim, against Licensor or any licensee alleging that the Original Work infringes a patent. This termination provision shall not apply for an action alleging patent infringement by combinations of the Original Work with other software or hardware.

11) Jurisdiction, Venue and Governing Law. Any action or suit relating to this License may be brought only in the courts of a jurisdiction wherein the Licensor resides or in which Licensor conducts its primary business, and under the laws of that jurisdiction excluding its conflict-of-law provisions. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded. Any use of the Original Work outside the scope of this License or after its termination shall be subject to the requirements and penalties of the U.S. Copyright Act, 17 U.S.C. 101 et seq., the equivalent laws of other countries, and international treaty. This section shall survive the termination of this License.

12) Attorneys Fees. In any action to enforce the terms of this License or seeking damages relating thereto, the prevailing party shall be

entitled to recover its costs and expenses, including, without limitation, reasonable attorneys' fees and costs incurred in connection with such action, including any appeal of such action. This section shall survive the termination of this License.

13) Miscellaneous. This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable.

14) Definition of "You" in This License. "You" throughout this License, whether in upper or lower case, means an individual or a legal entity exercising rights under, and complying with all of the terms of, this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with you. For purposes of this definition, "control" means (i) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (ii) ownership of fifty percent (50%) or more of the outstanding shares, or (iii) beneficial ownership of such entity.

15) Right to Use. You may use the Original Work in all ways not otherwise restricted or conditioned by this License or by law, and Licensor promises not to interfere with or be responsible for such uses by You.

This license is Copyright (C) 2003-2004 Lawrence E. Rosen. All rights reserved. Permission is hereby granted to copy and distribute this license without modification. This license may not be modified without the express written permission of its copyright owner.

--

END OF ACADEMIC FREE LICENSE. The following is intended to describe the essential differences between the Academic Free License (AFL) version 1.0 and other open source licenses:

The Academic Free License is similar to the BSD, MIT, UoI/NCSA and Apache licenses in many respects but it is intended to solve a few problems with those licenses.

* The AFL is written so as to make it clear what software is being licensed (by the inclusion of a statement following the copyright notice in the software). This way, the license functions better than a template license. The BSD, MIT and UoI/NCSA licenses apply to unidentified software.

* The AFL contains a complete copyright grant to the software.

The BSD

and Apache licenses are vague and incomplete in that respect.

* The AFL contains a complete patent grant to the software. The BSD, MIT, UoI/NCSA and Apache licenses rely on an implied patent license and contain no explicit patent grant.

* The AFL makes it clear that no trademark rights are granted to the licensor's trademarks. The Apache license contains such a provision, but the BSD, MIT and UoI/NCSA licenses do not.

* The AFL includes the warranty by the licensor that it either owns the copyright or that it is distributing the software under a license. None of the other licenses contain that warranty. All other warranties are disclaimed, as is the case for the other licenses.

* The AFL is itself copyrighted (with the right granted to copy and distribute without modification). This ensures that the owner of the copyright to the license will control changes. The Apache license contains a copyright notice, but the BSD, MIT and UoI/NCSA licenses do not.

--

START OF GNU GENERAL PUBLIC LICENSE

--

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom,

not

price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0.

This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law:

that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You

may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any

associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you

may not distribute the Program at all. For example,
if a patent
license would not permit royalty-free redistribution of the Program by
all those who receive copies directly or indirectly through you, then
the only way you could satisfy both it and this License would be to
refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under
any particular circumstance, the balance of the section is intended to
apply and the section as a whole is intended to apply in other
circumstances.

It is not the purpose of this section to induce you to infringe any
patents or other property right claims or to contest validity of any
such claims; this section has the sole purpose of protecting the
integrity of the free software distribution system, which is
implemented by public license practices. Many people have made
generous contributions to the wide range of software distributed
through that system in reliance on consistent application of that
system; it is up to the author/donor to decide
if he or she is willing
to distribute software through any other system and a licensee cannot
impose that choice.

This section is intended to make thoroughly clear what is believed to
be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in
certain countries either by patents or by copyrighted interfaces, the
original copyright holder who places the Program under this License
may add an explicit geographical distribution limitation excluding
those countries, so that distribution is permitted only in or among
countries not thus excluded. In such case, this License incorporates
the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions
of the General Public License from time to time. Such new versions will
be similar in spirit to the present version, but may differ in detail to
address new problems or concerns.

Each version is given a distinguishing version
number. If the Program
specifies a version number of this License which applies to it and "any
later version", you have the option of following the terms and conditions
either of that version or of any later version published by the Free
Software Foundation. If the Program does not specify a version number of
this License, you may choose any version ever published by the Free Software
Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show
c' for details.
```

The hypothetical commands ``show w'` and ``show c'` should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than ``show w'` and ``show c'`; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public

License instead of this License.

1.222 cyrus-sasl 2.1.23-13.el6_3.1

1.222.1 Available under license :

```
/* CMU libsasl
 * Tim Martin
 * Rob Earhart
 * Rob Siemborski
 */
/*
 * Copyright (c) 1998-2003 Carnegie Mellon University. All rights reserved.
 *
 * Redistribution and use in source and binary forms, with or without
 * modification, are permitted provided that the following conditions
 * are met:
 *
 * 1. Redistributions of source code must retain the above copyright
 * notice, this list of conditions and the following disclaimer.
 *
 * 2. Redistributions in binary form must reproduce the above copyright
 * notice, this list of conditions and the following disclaimer in
 * the documentation and/or other materials provided with the
 * distribution.
 *
 * 3. The name "Carnegie Mellon University" must not be used to
 * endorse or promote products derived from this software without
 * prior written permission. For permission or any other legal
 * details, please contact
 * Office of Technology Transfer
 * Carnegie Mellon University
 * 5000 Forbes Avenue
 * Pittsburgh, PA 15213-3890
 * (412) 268-4387, fax: (412) 268-7395
 * tech-transfer@andrew.cmu.edu
 *
 * 4. Redistributions of any form whatsoever must retain the following
 * acknowledgment:
 * "This product includes software developed by Computing Services
 * at Carnegie Mellon University (http://www.cmu.edu/computing/)."
```

* CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO
* THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY
* AND FITNESS, IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE
* FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES
* WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN
* AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING

* OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

*/

/* CMU libsasl

* Tim Martin

* Rob Earhart

* Rob Siemborski

*/

/*

* Copyright (c) 2001 Carnegie Mellon University. All rights reserved.

*

* Redistribution and use in source and binary forms, with or without

* modification, are permitted provided that the following conditions

* are met:

*

* 1. Redistributions of source code must retain the above copyright

* notice, this list of conditions and the following disclaimer.

*

* 2. Redistributions in binary form must reproduce the above copyright

* notice, this list of conditions and the following disclaimer in

* the documentation and/or other materials provided with the

* distribution.

*

* 3. The name "Carnegie Mellon University" must not be used to

* endorse or promote products derived from this software without

* prior written permission. For permission or any other legal

* details, please contact

* Office of Technology Transfer

* Carnegie Mellon University

* 5000 Forbes Avenue

* Pittsburgh, PA 15213-3890

* (412) 268-4387, fax: (412) 268-7395

* tech-transfer@andrew.cmu.edu

*

* 4. Redistributions of any form whatsoever must retain the following

* acknowledgment:

* "This product includes software developed by Computing Services

* at Carnegie Mellon University (<http://www.cmu.edu/computing/>)."

*

* CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO

* THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY

* AND FITNESS, IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE

* FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES

* WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN

* AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING

* OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

*/

Copyright (C) 1995-1997 Eric Young (eay@mincom.oz.au)

All rights reserved.

This package is an DES implementation written by Eric Young (eay@mincom.oz.au).
The implementation was written so as to conform with MIT's libdes.

This library is free for commercial and non-commercial use as long as the following conditions are adhered to. The following conditions apply to all code found in this distribution.

Copyright remains Eric Young's, and as such any Copyright notices in the code are not to be removed.

If this package is used in a product, Eric Young should be given attribution as the author of that the SSL library. This can be in the form of a textual message at program startup or in documentation (online or textual) provided with the package.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgement:
This product includes software developed by Eric Young (eay@mincom.oz.au)

THIS SOFTWARE IS PROVIDED BY ERIC YOUNG ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The license and distribution terms for any publically available version or derivative of this code cannot be changed. i.e. this code cannot simply be copied and put under another distribution license [including the GNU Public License.]

The reason behind this being stated in this direct manner is past experience in code simply being copied and the attribution removed

from it and then being distributed as part of other packages. This implementation was a non-trivial and unpaid effort.

Copyright 1998 by Carnegie Mellon University

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Carnegie Mellon University not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

1.223 iproute 2.6.32-23.el6

1.223.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not

price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law:

that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any

associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you

may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.224 texinfo 4.13a-8.el6

1.224.1 Available under license :

\input texinfo @c -*-texinfo-*-

@copying

Public domain.

@end copying

@insertcopying

@bye

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether

gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this

License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To

"modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than

the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major

Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction

and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is

released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the

product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge.

You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute

modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the

additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time

you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not

impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you

to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <<http://www.gnu.org/licenses/>>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first,

please read
<<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

1.225 kerberos 1.10

1.225.1 Available under license :

[NOTE: MIT has only incorporated the mechglue and spnego change, and not the incremental propagation changes. The filenames are different between the Sun and MIT sources. The actual MIT filenames appear in the top-level README file. Original text of Sun's LICENSE file follows.]

Subject to the license set forth below, Sun Microsystems, Inc. donates the attached files to MIT for the purpose of including these modifications and additions in future versions of the Kerberos system.

Many of the files attached are subject to licenses issued by other entities, including OpenVision, MIT, and FundsXpress. See the individual files, and/or related Readme files, for these licenses.

In addition Sun requires that the license set forth below be incorporated into any future version of the Kerberos system which contains portions of the files attached. The following files must be listed, in the top level Readme file, as being provided subject to such license:

```
cmd/krb5/iprop/iprop.x
cmd/krb5/iprop/iprop_hdr.h
cmd/krb5/kadmin/server/ipropd_svc.c
cmd/krb5/kproplog/kproplog.c
cmd/krb5/slave/kpropd_rpc.c
lib/gss_mechs/mech_krb5/et/kdb5_err.c
lib/gss_mechs/mech_spnego/mech/gssapiP_spnego.h
lib/gss_mechs/mech_spnego/mech/spnego_mech.c
lib/krb5/kadm5/kadm_host_srv_names.c
lib/krb5/kdb/kdb_convert.c
lib/krb5/kdb/kdb_hdr.h
lib/krb5/kdb/kdb_log.c
lib/krb5/kdb/kdb_log.h
lib/libgss/g_accept_sec_context.c
lib/libgss/g_acquire_cred.c
lib/libgss/g_canon_name.c
lib/libgss/g_compare_name.c
lib/libgss/g_context_time.c
lib/libgss/g_delete_sec_context.c
lib/libgss/g_dsp_name.c
lib/libgss/g_dsp_status.c
```

lib/libgss/g_dup_name.c
lib/libgss/g_exp_sec_context.c
lib/libgss/g_export_name.c
lib/libgss/g_glue.c
lib/libgss/g_imp_name.c
lib/libgss/g_imp_sec_context.c
lib/libgss/g_init_sec_context.c
lib/libgss/g_initialize.c
lib/libgss/g_inquire_context.c
lib/libgss/g_inquire_cred.c
lib/libgss/g_inquire_names.c
lib/libgss/g_process_context.c
lib/libgss/g_rel_buffer.c
lib/libgss/g_rel_cred.c
lib/libgss/g_rel_name.c
lib/libgss/g_rel_oid_set.c
lib/libgss/g_seal.c
lib/libgss/g_sign.c
lib/libgss/g_store_cred.c
lib/libgss/g_unseal.c
lib/libgss/g_userok.c
lib/libgss/g_utils.c
lib/libgss/g_verify.c
lib/libgss/gssd_pname_to_uid.c
uts/common/gssapi/include/gssapi_err_generic.h
uts/common/gssapi/include/mechglueP.h

Sun's

License is as follows:

Copyright (c) 2004 Sun Microsystems, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY

CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright (C) 1985-2019 by the Massachusetts Institute of Technology.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Downloading of this software may constitute an export of cryptographic software from the United States of America that is subject to the United States Export Administration Regulations (EAR), 15 CFR 730-774. Additional laws or regulations may apply. It is the responsibility of the person or entity contemplating export to comply with all applicable export laws and regulations, including obtaining any required license from the U.S. government.

The U.S. government prohibits export of encryption source code to certain countries and individuals, including, but not limited to, the countries of Cuba, Iran, North Korea, Sudan, Syria, and residents and nationals of those countries.

Documentation components of this software distribution are licensed under a Creative Commons Attribution-ShareAlike 3.0 Unported License. (<https://creativecommons.org/licenses/by-sa/3.0/>)

Individual source code files are copyright MIT, Cygnus Support, Novell, OpenVision Technologies, Oracle, Red Hat, Sun Microsystems, FundsXpress, and others.

Project Athena, Athena, Athena MUSE, Discuss, Hesiod, Kerberos, Moira, and Zephyr are trademarks of the Massachusetts Institute of Technology (MIT). No commercial use of these trademarks may be made without prior written permission of MIT.

"Commercial use" means use of a name in a product or other for-profit manner. It does NOT prevent a commercial firm from referring to the MIT trademarks in order to convey information (although in doing so, recognition of their trademark status should be given).

=====
The following copyright and permission notice applies to the OpenVision Kerberos Administration system located in "kadmin/create", "kadmin/dbutil", "kadmin/passwd", "kadmin/server", "lib/kadm5", and portions of "lib/rpc":

Copyright, OpenVision Technologies, Inc., 1993-1996, All Rights Reserved

WARNING: Retrieving the OpenVision Kerberos Administration system source code, as described below, indicates your acceptance of the following terms. If you do not agree to the following terms, do not retrieve the OpenVision Kerberos administration system.

You may freely use and distribute the Source Code and Object Code compiled from it, with or without modification, but this Source Code is provided to you "AS IS" EXCLUSIVE OF ANY WARRANTY, INCLUDING, WITHOUT LIMITATION, ANY WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE, OR ANY OTHER WARRANTY, WHETHER EXPRESS OR IMPLIED. IN NO EVENT WILL OPENVISION HAVE ANY LIABILITY FOR ANY LOST PROFITS, LOSS OF DATA OR COSTS OF PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES, OR FOR ANY SPECIAL, INDIRECT, OR CONSEQUENTIAL DAMAGES ARISING OUT OF THIS AGREEMENT, INCLUDING, WITHOUT LIMITATION, THOSE RESULTING FROM THE USE OF THE SOURCE CODE, OR THE FAILURE OF THE SOURCE CODE TO PERFORM, OR FOR ANY OTHER REASON.

OpenVision retains all copyrights in the donated Source Code. OpenVision also retains copyright to derivative works of the Source Code, whether created by OpenVision or by a third party. The

OpenVision copyright notice must be preserved if derivative works are made based on the donated Source Code.

OpenVision Technologies, Inc. has donated this Kerberos Administration system to MIT for inclusion in the standard Kerberos 5 distribution. This donation underscores our commitment to continuing Kerberos technology development and our gratitude for the valuable work which has been performed by MIT and the Kerberos community.

=====
Portions contributed by Matt Crawford "crawd@fnal.gov" were work performed at Fermi National Accelerator Laboratory, which is operated by Universities Research Association, Inc., under contract DE-AC02-76CHO3000 with the U.S. Department of Energy.

=====
Portions of "src/lib/crypto" have the following copyright:

Copyright (C) 1998 by the FundsXpress, INC.

All rights reserved.

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of FundsXpress. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. FundsXpress makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

THIS SOFTWARE IS PROVIDED "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

The implementation of the AES encryption algorithm in "src/lib/crypto/builtin/aes" has the following copyright:

Copyright (C) 2001, Dr Brian Gladman "brg@gladman.uk.net",
Worcester, UK.
All rights reserved.

LICENSE TERMS

The free distribution and use of this software in both source and binary form is allowed (with or without changes) provided that:

1. distributions of this source code include the above copyright notice, this list of conditions and the following disclaimer;
2. distributions in binary form include the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other associated materials;
3. the copyright holder's name is not used to endorse products built using this software without specific written permission.

DISCLAIMER

This software is provided 'as is' with no explicit or implied warranties in respect of any properties, including, but not limited to, correctness and fitness for purpose.

=====

Portions contributed by Red Hat, including the pre-authentication plug-in framework and the NSS crypto implementation, contain the following copyright:

Copyright (C) 2006 Red Hat, Inc.
Portions
copyright (C) 2006 Massachusetts Institute of Technology
All Rights Reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above

copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

* Neither the name of Red Hat, Inc., nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====

The bundled verto source code is subject to the following license:

Copyright 2011 Red Hat, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

=====
The MS-KKDCP client implementation has the following copyright:

Copyright 2013,2014

Red Hat, Inc.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====
The implementations of GSSAPI mechglue in GSSAPI-SPNEGO in "src/lib/gssapi", including the following files:

lib/gssapi/generic/gssapi_err_generic.et
lib/gssapi/mechglue/g_accept_sec_context.c
lib/gssapi/mechglue/g_acquire_cred.c
lib/gssapi/mechglue/g_canon_name.c
lib/gssapi/mechglue/g_compare_name.c
lib/gssapi/mechglue/g_context_time.c
lib/gssapi/mechglue/g_delete_sec_context.c
lib/gssapi/mechglue/g_dsp_name.c

lib/gssapi/mechglue/g_dsp_status.c
lib/gssapi/mechglue/g_dup_name.c
lib/gssapi/mechglue/g_exp_sec_context.c
lib/gssapi/mechglue/g_export_name.c
lib/gssapi/mechglue/g_glue.c
lib/gssapi/mechglue/g_imp_name.c
lib/gssapi/mechglue/g_imp_sec_context.c
lib/gssapi/mechglue/g_init_sec_context.c
lib/gssapi/mechglue/g_initialize.c
lib/gssapi/mechglue/g_inquire_context.c
lib/gssapi/mechglue/g_inquire_cred.c
lib/gssapi/mechglue/g_inquire_names.c
lib/gssapi/mechglue/g_process_context.c
lib/gssapi/mechglue/g_rel_buffer.c
lib/gssapi/mechglue/g_rel_cred.c
lib/gssapi/mechglue/g_rel_name.c
lib/gssapi/mechglue/g_rel_oid_set.c
lib/gssapi/mechglue/g_seal.c
lib/gssapi/mechglue/g_sign.c
lib/gssapi/mechglue/g_store_cred.c
lib/gssapi/mechglue/g_unseal.c
lib/gssapi/mechglue/g_userok.c
lib/gssapi/mechglue/g_utils.c
lib/gssapi/mechglue/g_verify.c
lib/gssapi/mechglue/gssd_pname_to_uid.c
lib/gssapi/mechglue/mglueP.h
lib/gssapi/mechglue/oid_ops.c
lib/gssapi/spnego/gssapiP_spnego.h
lib/gssapi/spnego/spnego_mech.c

and the initial implementation of incremental propagation,
including
the following new or changed files:

include/iprop_hdr.h
kadmin/server/ipropd_svc.c
lib/kdb/iprop.x
lib/kdb/kdb_convert.c
lib/kdb/kdb_log.c
lib/kdb/kdb_log.h
lib/krb5/error_tables/kdb5_err.et
kprop/kpropd_rpc.c
kprop/kproplog.c

are subject to the following license:

Copyright (C) 2004 Sun Microsystems, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

=====
Kerberos V5 includes documentation and software developed at the University of California at Berkeley, which includes this copyright notice:

Copyright (C) 1983 Regents of the University of California.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Portions contributed by Novell, Inc., including the LDAP database backend, are subject to the following license:

Copyright (C) 2004-2005, Novell, Inc.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * The copyright holder's name is not used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT,

STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED
OF THE POSSIBILITY OF SUCH DAMAGE.

=====
Portions

funded by Sandia National Laboratory and developed by the
University of Michigan's Center for Information Technology
Integration, including the PKINIT implementation, are subject to the
following license:

COPYRIGHT (C) 2006-2007
THE REGENTS OF THE UNIVERSITY OF MICHIGAN
ALL RIGHTS RESERVED

Permission is granted to use, copy, create derivative works and
redistribute this software and such derivative works for any
purpose, so long as the name of The University of Michigan is not
used in any advertising or publicity pertaining to the use of
distribution of this software without specific, written prior
authorization. If the above copyright notice or any other
identification of the University of Michigan is included in any
copy of any portion of this software, then the disclaimer below
must also be included.

THIS SOFTWARE IS PROVIDED AS IS, WITHOUT REPRESENTATION FROM THE
UNIVERSITY OF MICHIGAN
AS TO ITS FITNESS FOR ANY PURPOSE, AND
WITHOUT WARRANTY BY THE UNIVERSITY OF MICHIGAN OF ANY KIND, EITHER
EXPRESS OR IMPLIED, INCLUDING WITHOUT LIMITATION THE IMPLIED
WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.
THE REGENTS OF THE UNIVERSITY OF MICHIGAN SHALL NOT BE LIABLE FOR
ANY DAMAGES, INCLUDING SPECIAL, INDIRECT, INCIDENTAL, OR
CONSEQUENTIAL DAMAGES, WITH RESPECT TO ANY CLAIM ARISING OUT OF OR
IN CONNECTION WITH THE USE OF THE SOFTWARE, EVEN IF IT HAS BEEN OR
IS HEREAFTER ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

=====
The pkcs11.h file included in the PKINIT code has the following
license:

Copyright 2006 g10 Code GmbH
Copyright 2006 Andreas Jellinghaus

This file is free software; as a special exception the author gives
unlimited permission to copy and/or distribute it, with or without

modifications, as long as this notice is preserved.

This file is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY, to the extent permitted by law; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

=====
Portions contributed by Apple Inc. are subject to the following license:

Copyright 2004-2008 Apple Inc. All Rights Reserved.

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Apple Inc. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Apple Inc. makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

THIS SOFTWARE IS PROVIDED "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

=====
The implementations of UTF-8 string handling in src/util/support and src/lib/krb5/unicode are subject to the following copyright and permission notice:

The OpenLDAP Public License
Version 2.8, 17 August 2003

Redistribution and use of this software and associated documentation ("Software"), with or without modification, are permitted provided that

the following conditions are met:

1. Redistributions in source form must retain copyright statements and notices,
2. Redistributions in binary form must reproduce applicable copyright statements and notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution, and
3. Redistributions must contain a verbatim copy of this document.

The OpenLDAP Foundation may revise this license from time to time. Each revision is distinguished by a version number. You may use this Software under terms of this license revision or under the terms of any subsequent revision of the license.

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND ITS CONTRIBUTORS "AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OPENLDAP FOUNDATION, ITS CONTRIBUTORS, OR THE AUTHOR(S) OR OWNER(S) OF THE SOFTWARE BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The names of the authors and copyright holders must not be used in advertising or otherwise to promote the sale, use or other dealing in this Software without specific, written prior permission. Title to copyright in this Software shall at all times remain with copyright holders.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Copyright 1999-2003 The OpenLDAP Foundation, Redwood City, California, USA. All Rights Reserved. Permission to copy and distribute verbatim copies of this document is granted.

=====

Marked test programs in src/lib/krb5/krb have the following copyright:

Copyright (C) 2006 Kungliga Tekniska Hgskola
(Royal Institute of Technology, Stockholm, Sweden).
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above
copyright notice, this list of conditions and the following
disclaimer.
2. Redistributions in binary form must reproduce the above
copyright notice, this list of conditions and the following
disclaimer in the documentation and/or other materials provided
with the distribution.
3. Neither the name of KTH nor the names of its contributors may

be used to endorse or promote products derived from this
software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY KTH AND ITS CONTRIBUTORS "AS IS" AND
ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO,
THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A
PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL KTH OR ITS
CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT
LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF
USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND
ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY,
OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT
OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

=====

The KCM Mach RPC definition file used on macOS
has the following
copyright:

Copyright (C) 2009 Kungliga Tekniska Hgskola
(Royal Institute of Technology, Stockholm, Sweden).
All rights reserved.

Portions Copyright (C) 2009 Apple Inc. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the Institute nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE INSTITUTE AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE INSTITUTE OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====

Portions of the RPC implementation in src/lib/rpc and src/include/gssrpc have the following copyright and permission notice:

Copyright (C) 2010, Oracle America, Inc.

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following

disclaimer.

2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the "Oracle America, Inc." nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED.

IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====
Copyright (C) 2006,2007,2009 NTT (Nippon Telegraph and Telephone Corporation). All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer as the first lines of this file unmodified.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY NTT "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL NTT BE LIABLE FOR ANY DIRECT,

INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====

Copyright 2000 by Carnegie Mellon University

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Carnegie Mellon University not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

CARNEGIE MELLON UNIVERSITY DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL CARNEGIE MELLON UNIVERSITY BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

=====

Copyright (C) 2002 Naval Research Laboratory (NRL/CCS)

Permission to use, copy, modify and distribute this software and its documentation is hereby granted, provided that both the copyright notice and this permission notice appear in all copies of the software, derivative works or modified versions, and any portions thereof.

NRL ALLOWS FREE USE OF THIS SOFTWARE IN ITS "AS IS" CONDITION AND DISCLAIMS ANY LIABILITY OF ANY KIND FOR ANY DAMAGES WHATSOEVER RESULTING FROM THE USE OF THIS SOFTWARE.

=====
Copyright (C) 1991, 1992, 1994 by Cygnus Support.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation. Cygnus Support makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

=====
Copyright (C) 2006 Secure Endpoints Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

=====
Portions of the implementation of the Fortuna-like PRNG are subject to the following notice:

Copyright (C) 2005 Marko Kreen
All rights reserved.

Redistribution and use in source and binary forms, with or without

modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (C) 1994 by the University of Southern California

EXPORT OF THIS SOFTWARE from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to copy, modify, and distribute this software and its documentation in source and binary forms is hereby granted, provided that any documentation or other materials related to such distribution or use acknowledge that the software was developed by the University of Southern California.

DISCLAIMER OF WARRANTY. THIS SOFTWARE IS PROVIDED "AS IS". The University of Southern California MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. By way of example, but not limitation, the University of Southern California MAKES NO REPRESENTATIONS OR WARRANTIES OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE. The University of Southern California shall not be held liable for any liability nor for any direct, indirect, or

consequential damages with respect to any claim by the user or distributor of the ksu software.

Copyright (C) 1995
The President and Fellows of Harvard University

This code is derived from software contributed to Harvard by Jeremy Rassen.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgement:

This product includes software developed by the University of California, Berkeley and its contributors.

4. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====
Copyright (C) 2008 by the Massachusetts Institute of Technology.
Copyright 1995 by Richard P. Basch. All Rights Reserved.
Copyright 1995 by Lehman Brothers, Inc. All Rights Reserved.

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Richard P. Basch, Lehman Brothers and M.I.T. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Richard P. Basch, Lehman Brothers and M.I.T. make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

=====
The following notice applies to "src/lib/krb5/krb/strptime.c" and "src/include/k5-queue.h".

Copyright (C) 1997, 1998 The NetBSD Foundation, Inc.
All rights reserved.

This code was contributed to The NetBSD Foundation by Klaus Klein.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

3. All advertising materials mentioning features or use of this software must display the following acknowledgement:

This product includes software developed by the NetBSD Foundation, Inc. and its contributors.

4. Neither the name of The NetBSD Foundation nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE NETBSD FOUNDATION, INC. AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE FOUNDATION OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====

The following notice applies to Unicode library files in "src/lib/krb5/unicode":

Copyright 1997, 1998, 1999 Computing Research Labs,
New Mexico State University

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND,

EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE COMPUTING RESEARCH LAB OR NEW MEXICO STATE UNIVERSITY BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

=====

The following notice applies to "src/util/support/strcpy.c":

Copyright (C) 1998 Todd C. Miller "Todd.Miller@courtesan.com"

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND THE AUTHOR DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

=====

The following notice applies to "src/util/profile/argv_parse.c" and "src/util/profile/argv_parse.h":

Copyright 1999 by Theodore Ts'o.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies. THE SOFTWARE IS PROVIDED "AS IS" AND THEODORE TS'O (THE AUTHOR) DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE. (Isn't

it sick that the U.S. culture of lawsuit-happy lawyers requires
this
kind of disclaimer?)

The following notice applies to SWIG-generated code in
"src/util/profile/profile_tcl.c":

Copyright (C) 1999-2000, The University of Chicago

This file may be freely redistributed without license or fee
provided this copyright message remains intact.

The following notice applies to portions of "src/lib/rpc" and
"src/include/gssrpc":

Copyright (C) 2000 The Regents of the University of Michigan. All
rights reserved.

Copyright (C) 2000 Dug Song "dugsong@UMICH.EDU". All rights
reserved, all wrongs reversed.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above
copyright notice, this list of conditions and the following
disclaimer.
2. Redistributions in binary form must reproduce the above
copyright notice, this list of conditions and the following
disclaimer in the documentation and/or other materials provided
with the distribution.
3. Neither the name of the University nor the names of its
contributors may be used to endorse or promote products derived
from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED "AS IS" AND ANY EXPRESS OR IMPLIED
WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES
OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE
DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE
FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR

CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====

Implementations of the MD4 algorithm are subject to the following notice:

Copyright (C) 1990, RSA Data Security, Inc. All rights reserved.

License to copy and use this software is granted provided that it is identified as the "RSA Data Security, Inc. MD4 Message Digest Algorithm" in all material mentioning or referencing this software or this function.

License is also granted to make and use derivative works provided that such works are identified as "derived from the RSA Data Security, Inc. MD4 Message Digest Algorithm" in all material mentioning or referencing the derived work.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

=====

Implementations of the MD5 algorithm are subject to the following notice:

Copyright (C) 1990, RSA Data Security, Inc. All rights reserved.

License to copy and use this software is granted provided that it is identified as the "RSA Data Security, Inc. MD5 Message- Digest Algorithm" in all material mentioning or referencing this software or this function.

License is also granted to make and use derivative works provided

that such works are identified as "derived from the RSA Data Security, Inc. MD5 Message-Digest Algorithm" in all material mentioning or referencing the derived work.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

=====

The following notice applies to
"src/lib/crypto/crypto_tests/t_md driver.c":

Copyright (C) 1990-2, RSA Data Security, Inc. Created 1990. All rights reserved.

RSA Data Security, Inc. makes no representations concerning either the merchantability of this software or the suitability of this software for any particular purpose. It is provided "as is" without express or implied warranty of any kind.

These notices must be retained in any copies of any part of this documentation and/or software.

=====

Portions of "src/lib/krb5" are subject to the following notice:

Copyright (C) 1994 CyberSAFE Corporation.
Copyright 1990,1991,2007,2008 by the Massachusetts
Institute of Technology.
All Rights Reserved.

Export of this software from the United States of America may require a specific license from the United States Government. It is the responsibility of any person or organization contemplating export to obtain such a license before exporting.

WITHIN THAT CONSTRAINT, permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and

this permission notice appear in supporting documentation, and that the name of M.I.T. not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Furthermore if you modify this software you must label your software as modified software and not distribute it in such a fashion that it might be confused with the original M.I.T. software. Neither M.I.T., the Open Computing Security Group, nor CyberSAFE Corporation make any representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

=====

Portions contributed by PADL Software are subject to the following license:

Copyright (c) 2011, PADL Software Pty Ltd. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of PADL Software nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY PADL SOFTWARE AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL PADL SOFTWARE OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE

OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====

The bundled libev source code is subject to the following license:

All files in libev are Copyright (C)2007,2008,2009 Marc Alexander Lehmann.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS

FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Alternatively, the contents of this package may be used under the terms of the GNU General Public License ("GPL") version 2 or any later version, in which case the provisions of the GPL are applicable instead of the above. If you wish to allow the use of your version of this package only under the terms of the GPL and not to allow others to use your version of this file under the BSD

license, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the GPL in this and the other files of this package. If you do not delete the provisions above, a recipient may use your version of this file under either the BSD or the GPL.

=====
Files copied from the Intel AESNI Sample Library are subject to the following license:

Copyright (C) 2010, Intel Corporation All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * Neither the name of Intel Corporation nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====
The following notice applies to
"src/ccapi/common/win/OldCC/autolock.hxx":

Copyright (C) 1998 by Danilo Almeida. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

=====

The following notice applies to portions of
"src/plugins/preauth/spake/edwards25519.c" and
"src/plugins/preauth/spake/edwards25519_tables.h":

The MIT License (MIT)

Copyright (c) 2015-2016 the fiat-crypto authors (see the AUTHORS file).

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

=====

The following notice applies to portions of "src/plugins/preauth/spake/edwards25519.c":

Copyright (c) 2015-2016, Google Inc.

Permission to use, copy, modify, and/or distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND THE AUTHOR DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright
=====

Copyright |copy| 1985-2019 by the Massachusetts Institute of Technology and its contributors. All rights reserved.

See :ref:`mitK5license` for additional copyright and license information.

.. _mitK5license:

MIT Kerberos License information

=====

.. toctree::
:hidden:

copyright.rst

.. include:: notice.rst

1.226 file 5.04-15.el6

1.226.1 Available under license :

\$File: COPYING,v 1.1 2008/02/05 19:08:11 christos Exp \$
Copyright (c) Ian F. Darwin 1986, 1987, 1989, 1990, 1991, 1992, 1994, 1995.
Software written by Ian F. Darwin and others;
maintained 1994- Christos Zoulas.

This software is not subject to any export provision of the United States Department of Commerce, and may be exported to any country or planet.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice immediately at the beginning of the file, without modification, this list of conditions, and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.227 glib 2.22.5-7.el6

1.227.1 Available under license :

This work may be reproduced and distributed in whole or in part, in any medium, physical or electronic, so as long as this copyright notice remains intact and unchanged on all copies. Commercial redistribution is permitted and encouraged, but you may not redistribute, in whole or in part, under terms more restrictive than those under which you received it. If you redistribute a modified or translated version of this work, you must also make the source code to

the modified or translated version available in electronic form without charge. However, mere aggregation as part of a larger work shall not count as a modification for this purpose.

All code examples in this work are placed into the public domain, and may be used, modified and redistributed without restriction.

BECAUSE THIS WORK IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE WORK, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE WORK "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. SHOULD THE WORK PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY REPAIR OR CORRECTION.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE WORK AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE WORK, EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

PCRE LICENCE

Please see the file LICENCE in the PCRE distribution for licensing details.

End

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some

specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain

designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2,

instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline

functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are

prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR

CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year>

<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary.

Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

1.228 patch 2.6-6.el6

1.228.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of

packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works

for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.

b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as

long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a

copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent

the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you

must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and

propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or

that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's

public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it

free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to

do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

1.229 open-ldap 2.4.23-32.el6_4.1

1.229.1 Available under license :

NeoSoft Tcl client extensions to Lightweight Directory Access Protocol.

Copyright (c) 1998-1999 NeoSoft, Inc.
All Rights Reserved.

This software may be used, modified, copied, distributed, and sold, in both source and binary form provided that these copyrights are retained and their terms are followed.

Under no circumstances are the authors or NeoSoft Inc. responsible for the proper functioning of this software, nor do the authors assume any liability for damages incurred with its use.

Redistribution and use in source and binary forms are permitted provided that this notice is preserved and that due credit is given to NeoSoft, Inc.

NeoSoft, Inc. may not be used to endorse or promote products derived from this software without specific prior written permission. This software is provided ``as is'' without express or implied warranty.

Requests for permission may be sent to NeoSoft Inc, 1770 St. James Place, Suite 500, Houston, TX, 77056.
Copyright 1998-2010 The OpenLDAP Foundation
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted only as authorized by the OpenLDAP Public License.

A copy of this license is available in the file LICENSE in the top-level directory of the distribution or, alternatively, at <<http://www.OpenLDAP.org/license.html>>.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Individual files and/or contributed packages may be copyright by other parties and/or subject to additional restrictions.

This work is derived from the University of Michigan LDAP v3.3

distribution. Information concerning this software is available at <http://www.umich.edu/~dirsvcs/ldap/ldap.html>.

This work also contains materials derived from public sources.

Additional information about OpenLDAP can be obtained at <http://www.openldap.org/>.

Portions Copyright 1998-2008 Kurt D. Zeilenga.
Portions Copyright 1998-2006 Net Boolean Incorporated.
Portions
Copyright 2001-2006 IBM Corporation.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted only as authorized by the OpenLDAP Public License.

Portions Copyright 1999-2008 Howard Y.H. Chu.
Portions Copyright 1999-2008 Symas Corporation.
Portions Copyright 1998-2003 Hallvard B. Furuseth.
Portions Copyright 2008-2009 Gavin Henry.
Portions Copyright 2008-2009 Suretec Systems Ltd.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that this notice is preserved. The names of the copyright holders may not be used to endorse or promote products derived from this software without their specific prior written permission. This software is provided ``as is" without express or implied warranty.

Portions Copyright (c) 1992-1996 Regents of the University of Michigan.
All rights reserved.

Redistribution and use in source and binary forms are permitted provided that this notice is preserved and that due credit is given to the University of Michigan at Ann Arbor. The name of the University may not be used to endorse or promote products derived from this software without specific prior written permission. This software is provided ``as is" without express or implied warranty.

/******

*

* Copyright (C) 2000 Pierangelo Masarati, <ando@sys-net.it>

* All rights reserved.

*

* Permission is granted to anyone to use this software for any purpose

* on any computer system, and to alter it and redistribute it, subject

* to the following restrictions:

*

* 1. The author is not responsible for the consequences of use of this

* software, no matter how awful, even if they arise from flaws in it.

*

* 2. The origin of this software must not be misrepresented, either by

* explicit claim or by omission. Since few users ever read sources,

* credits should appear in the documentation.

*

* 3. Altered versions must be plainly marked as such, and must not be

* misrepresented as being the original software. Since few users

* ever read sources, credits should appear in the documentation.

*

* 4. This notice may not be removed or altered.

*

*****/

The OpenLDAP Public License

Version 2.7, 7 September 2001

Redistribution and use of this software and associated documentation ("Software"), with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain copyright statements and notices,
2. Redistributions in binary form must reproduce applicable copyright statements and notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution, and
3. Redistributions must contain a verbatim copy of this document.

The OpenLDAP Foundation may revise this license from time to time. Each revision is distinguished by a version number. You may use this Software under terms of this license revision or under the terms of any subsequent revision of the license.

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND ITS CONTRIBUTORS ``AS IS'' AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING,

BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OPENLDAP FOUNDATION, ITS CONTRIBUTORS, OR THE AUTHOR(S) OR OWNER(S) OF THE SOFTWARE BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The names of the authors and copyright holders must not be used in advertising or otherwise to promote the sale, use or other dealing in this Software without specific, written prior permission. Title to copyright in this Software shall at all times remain with copyright holders.

OpenLDAP is a registered trademark
of the OpenLDAP Foundation.

Copyright 1999-2003 The OpenLDAP Foundation, Redwood City,
California, USA. All Rights Reserved. Permission to copy and
distribute verbatim copies of this document is granted.

Copyright 1998-2010 The OpenLDAP Foundation
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted only as authorized by the OpenLDAP
Public License. A copy of this license is available at
<http://www.OpenLDAP.org/license.html> or in file LICENSE in the
top-level directory of the distribution.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Individual files and/or contributed packages may be copyright by
other parties and subject to additional restrictions.

This work is derived from the University of Michigan LDAP v3.3
distribution. Information concerning this software is available
at: <http://www.umich.edu/~dirsvcs/ldap/>

This work also contains materials derived from public sources.

Additional Information about OpenLDAP can be obtained at:
<http://www.openldap.org/>

or by sending e-mail to:

info@OpenLDAP.org

Portions Copyright (c) 1992-1996 Regents of the University of Michigan.
All rights reserved.

Redistribution

and use in source and binary forms are permitted provided that this notice is preserved and that due credit is given to the University of Michigan at Ann Arbor. The name of the University may not be used to endorse or promote products derived from this software without specific prior written permission. This software is provided ``as is" without express or implied warranty.

The OpenLDAP Public License

Version 2.8, 17 August 2003

Redistribution and use of this software and associated documentation ("Software"), with or without modification, are permitted provided that the following conditions are met:

1. Redistributions in source form must retain copyright statements and notices,
2. Redistributions in binary form must reproduce applicable copyright statements and notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution, and
3. Redistributions must contain a verbatim copy of this document.

The OpenLDAP Foundation may revise this license from time to time. Each revision is distinguished by a version number. You may use this Software under terms of this license revision or under the terms of any subsequent revision of the license.

THIS SOFTWARE IS PROVIDED BY THE OPENLDAP FOUNDATION AND ITS CONTRIBUTORS ``AS IS" AND ANY EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OPENLDAP FOUNDATION, ITS CONTRIBUTORS, OR THE AUTHOR(S) OR OWNER(S) OF THE SOFTWARE BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN

ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The names of the authors and copyright holders must not be used in advertising or otherwise to promote the sale, use or other dealing in this Software without specific, written prior permission. Title to copyright in this Software shall at all times remain with copyright holders.

OpenLDAP is a registered trademark of the OpenLDAP Foundation.

Copyright 1999-2003 The OpenLDAP Foundation, Redwood City, California, USA. All Rights Reserved. Permission to copy and distribute verbatim copies of this document is granted.

1.230 ca-certificates 2010.63-3.el6_1.5

1.230.1 Available under license :

No license file was found, but licenses were detected in source scan.

```
# This program is free software; you can redistribute it and/or modify
# it under the terms of the GNU General Public License as published by
# the Free Software Foundation; either version 2 of the License, or
# (at your option) any later version.
# This program is distributed in the hope that it will be useful,
# but WITHOUT ANY WARRANTY; without even the implied warranty of
# MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
# GNU General Public License for more details.
# You should have received a copy of the GNU General Public License
# along with this program; if not, write to the Free Software
```

Found in path(s):

```
* /opt/cola/permits/2005422292_1715245642.1702437/0/ca-certificates-2010.63-3.el6_1.5-1.src.rpm-cosi-expand-
archive-E6GauXTs/certdata2pem.py
```

No license file was found, but licenses were detected in source scan.

```
#!/usr/bin/perl -w
```

```
use diagnostics;
use Fcntl;
```

```
# Copyright (C) 2007, 2008 Red Hat, Inc.
```

```
#
```

```
# This program is free software; you can redistribute it and/or modify
# it under the terms of the GNU General Public License as published by
# the Free Software Foundation; either version 2 of the License, or
```

```

# (at your option) any later version.
#
# This program is distributed in the hope that it will be useful,
# but WITHOUT ANY WARRANTY; without even the implied warranty of
# MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
# GNU General Public License for more details.

# generate-cacerts.pl generates a JKS keystore named 'cacerts' from
# OpenSSL's certificate bundle using OpenJDK's keytool.

# First extract each of OpenSSL's bundled certificates into its own
# aliased filename.
$file = $ARGV[1];
open(CERTS, $file);
@certs = <CERTS>;
close(CERTS);

$pem_file_count = 0;
$in_cert_block = 0;
$write_current_cert
= 1;
foreach $cert (@certs)
{
  if ($cert =~ /Subject: /)
  {
    $_ = $cert;
    if ($cert =~ /personal-freemail/)
    {
      $cert_alias = "thawtepersonalfreemailca";
    }
    elsif ($cert =~ /personal-basic/)
    {
      $cert_alias = "thawtepersonalbasicca";
    }
    elsif ($cert =~ /personal-premium/)
    {
      $cert_alias = "thawtepersonalpremiumca";
    }
    elsif ($cert =~ /server-certs/)
    {
      $cert_alias = "thawteserverca";
    }
    elsif ($cert =~ /premium-server/)
    {
      $cert_alias = "thawtepremiumserverca";
    }
    elsif ($cert =~ /Class 1 Public Primary Certification Authority$/)
    {

```

```

    $cert_alias = "verisignclass1ca";
}
elseif ($cert =~ /Class 1 Public Primary Certification Authority - G2/)
{
    $cert_alias = "verisignclass1g2ca";
}
elseif ($cert =~
    /VeriSign Class 1 Public
Primary Certification Authority - G3/)
{
    $cert_alias = "verisignclass1g3ca";
}
elseif ($cert =~ /Class 2 Public Primary Certification Authority$/)
{
    $cert_alias = "verisignclass2ca";
}
elseif ($cert =~ /Class 2 Public Primary Certification Authority - G2/)
{
    $cert_alias = "verisignclass2g2ca";
}
elseif ($cert =~
    /VeriSign Class 2 Public Primary Certification Authority - G3/)
{
    $cert_alias = "verisignclass2g3ca";
}
elseif ($cert =~ /Class 3 Public Primary Certification Authority$/)
{
    $cert_alias = "verisignclass3ca";
}
# Version 1 of Class 3 Public Primary Certification Authority
# - G2 is added. Version 3 is excluded. See below.
elseif ($cert =~ /Class 3 Public Primary Certification Authority - G2.*1998/)
{
    $cert_alias = "verisignclass3g2ca";
}

elseif ($cert =~
    /VeriSign Class 3 Public Primary Certification Authority - G3/)
{
    $cert_alias = "verisignclass3g3ca";
}
elseif ($cert =~
    /RSA Data Security.*Secure Server Certification Authority/)
{
    $cert_alias = "rsaserverca";
}
elseif ($cert =~ /GTE CyberTrust Global Root/)
{

```

```

    $cert_alias = "gtecybertrustglobalca";
}
elseif ($cert =~ /Baltimore CyberTrust Root/)
{
    $cert_alias = "baltimorecybertrustca";
}
elseif ($cert =~ /www.entrust.net/Client_CA_Info/CPS/)
{
    $cert_alias = "entrustclientca";
}
elseif ($cert =~ /www.entrust.net/GCCA_CPS/)
{
    $cert_alias = "entrustglobalclientca";
}
elseif ($cert =~ /www.entrust.net/CPS_2048/)
{
    $cert_alias = "entrust2048ca";
}
elseif ($cert =~ /www.entrust.net/CPS incorp /)
{
    $cert_alias = "entrustsslca";
}
elseif ($cert =~ /www.entrust.net/SSL_CPS/)
{
    $cert_alias = "entrustgsslca";
}
elseif ($cert =~ /The Go Daddy Group/)
{
    $cert_alias = "godaddyclass2ca";
}
elseif ($cert =~ /Starfield Class 2 Certification Authority/)
{
    $cert_alias = "starfieldclass2ca";
}
elseif ($cert =~ /ValiCert Class 2 Policy Validation Authority/)
{
    $cert_alias = "valicertclass2ca";
}
elseif ($cert =~ /GeoTrust Global CA$/)
{
    $cert_alias = "geotrustglobalca";
}
elseif ($cert =~ /Equifax Secure Certificate Authority/)
{
    $cert_alias = "equifaxsecureca";
}
elseif ($cert =~ /Equifax Secure eBusiness CA-1/)

```



```

{
    $cert_alias = "equifaxsecureebusinessca1";
}
elseif ($cert =~ /Equifax Secure eBusiness CA-2/)
{
    $cert_alias = "equifaxsecureebusinessca2";
}
elseif ($cert =~ /Equifax Secure Global eBusiness CA-1/)
{
    $cert_alias = "equifaxsecureglobalebusinessca1";
}
elseif ($cert =~ /Sonera Class1 CA/)
{
    $cert_alias = "soneraclass1ca";
}
elseif ($cert =~ /Sonera Class2 CA/)
{
    $cert_alias = "soneraclass2ca";
}
elseif ($cert =~ /AAA Certificate Services/)
{
    $cert_alias = "comodoaaaca";
}
elseif ($cert =~ /AddTrust Class 1 CA Root/)
{
    $cert_alias = "addtrustclass1ca";
}
elseif ($cert =~ /AddTrust External CA Root/)
{
    $cert_alias = "addtrustexternalca";
}
elseif ($cert =~ /AddTrust Qualified CA Root/)
{
    $cert_alias = "addtrustqualifiedca";
}
elseif ($cert =~ /UTN-USERFirst-Hardware/)
{
    $cert_alias = "utnuserfirsthardwareca";
}
elseif ($cert =~ /UTN-USERFirst-Client Authentication and Email/)
{
    $cert_alias = "utnuserfirstclientauthemailca";
}
elseif ($cert =~ /UTN - DATACorp SGC/)
{
    $cert_alias = "utndatacorpsgccca";
}
elseif ($cert =~ /UTN-USERFirst-Object/)

```

```

{
    $cert_alias = "utnuserfirstobjectca";
}
elsif ($cert =~ /America Online Root Certification Authority 1/)
{
    $cert_alias = "aolrootca1";
}
elsif ($cert =~ /DigiCert Assured ID Root CA/)
{
    $cert_alias = "digicertassuredidrootca";
}
elsif ($cert =~ /DigiCert Global Root CA/)
{
    $cert_alias = "digicertglobalrootca";
}
elsif ($cert =~ /DigiCert High Assurance EV Root CA/)
{
    $cert_alias = "digicerthighassuranceevrootca";
}
elsif ($cert =~ /GlobalSign Root CA$/)
{
    $cert_alias
= "globalsignca";
}
elsif ($cert =~ /GlobalSign Root CA - R2/)
{
    $cert_alias = "globalsignr2ca";
}
elsif ($cert =~ /Elektronik.*Kas.*2005/)
{
    $cert_alias = "extra-elektronikkas2005";
}
# Mozilla does not provide these certificates:
# baltimorecodesigningca
# gtecybertrust5ca
# trustcenterclass2caii
# trustcenterclass4caii
# trustcenteruniversalcai
else
{
    # Generate an alias using the OU and CN attributes of the
    # Subject field if both are present, otherwise use only the
    # CN attribute. The Subject field must have either the OU
    # or the CN attribute.
    $_ = $cert;
    if ($cert =~ /OU=/)
    {
        s/Subject:.*?OU=//;
    }
}

```

```

    # Remove other occurrences of OU=.
    s/OU=.*CN=//;
    # Remove CN= if there were not
other occurrences of OU=.
    s/CN=//;
    s/\emailAddress.*//;
    s/Certificate Authority/ca/g;
    s/Certification Authority/ca/g;
}
elseif ($cert =~ /CN=/)
{
    s/Subject.*CN=//;
    s/\emailAddress.*//;
    s/Certificate Authority/ca/g;
    s/Certification Authority/ca/g;
}
s/W//g;
tr/A-Z/a-z/;
$cert_alias = "extra-$_";
}
print "$cert => alias $cert_alias\n";
}
# When it attempts to parse:
#
# Class 3 Public Primary Certification Authority - G2, Version 3
#
# keytool says:
#
# #2: ObjectId: 1.3.6.1.5.5.7.1.1 Criticality=false
# Unparseable AuthorityInfoAccess extension due to
# java.io.IOException: Invalid encoding of URI
#
# If we do not exclude this file
# openjdk/jdk/test/lib/security/cacerts/VerifyCACerts.java fails
# on this
cert, printing:
#
# Couldn't verify: java.security.SignatureException: Signature
# does not match.
#
elseif ($cert =~
    /A6:0F:34:C8:62:6C:81:F6:8B:F7:7D:A9:F6:67:58:8A:90:3F:7D:36/)
{
    $write_current_cert = 0;
    $pem_file_count--;
}
elseif ($cert eq "-----BEGIN CERTIFICATE-----\n")
{

```

```

if ($in_cert_block != 0)
{
    die "$file is malformed.";
}
$in_cert_block = 1;
if ($write_current_cert == 1)
{
    $pem_file_count++;
    print "writing $cert_alias.pem\n";
    sysopen(PEM, "$cert_alias.pem", O_WRONLY|O_CREAT|O_EXCL)
        || die("could not write file");
    print "opened $cert_alias";
    print PEM $cert;
    print "written $cert_alias.pem\n";
}
}
elseif ($cert eq "-----END CERTIFICATE-----\n")
{
    $in_cert_block = 0;
    if ($write_current_cert == 1)
    {
        print PEM $cert;
        close(PEM);
    }
    $write_current_cert = 1
}
else
{
    if ($in_cert_block == 1 && $write_current_cert == 1)
    {
        print PEM $cert;
    }
}
}

```

Check that the correct number of .pem files were produced.

```

@pem_files = <*.pem>;
if (@pem_files != $pem_file_count)
{
    print "$pem_file_count != ".@pem_files."\n";
    die "Number of .pem files produced does not match".
        " number of certs read from $file.";
}

```

Now store each cert in the 'cacerts' file using keytool.

```

$certs_written_count = 0;
foreach $pem_file (@pem_files)
{

```

```

system "/bin/echo yes | $ARGV[0] -import".
" -alias `basename $pem_file .pem`".
" -keystore cacerts -storepass 'changeit' -file $pem_file";
unlink($pem_file);
$certs_written_count++;
}

# Check that the correct number of certs were added to the keystore.
if ($certs_written_count != $pem_file_count)
{
    die "Number of certs added to keystore does not match".
        " number
of certs read from $file.";
}

```

Found in path(s):

```
* /opt/cola/permits/2005422292_1715245642.1702437/0/ca-certificates-2010.63-3.el6_1.5-1.src.rpm-cosi-expand-
archive-E6GauXTs/generate-cacerts.pl
```

No license file was found, but licenses were detected in source scan.

License: Public Domain

Found in path(s):

```
* /opt/cola/permits/2005422292_1715245642.1702437/0/ca-certificates-2010.63-3.el6_1.5-1.src.rpm-cosi-expand-
archive-E6GauXTs/ca-certificates.spec
```

No license file was found, but licenses were detected in source scan.

```

#
# ***** BEGIN LICENSE BLOCK *****
# Version: MPL 1.1/GPL 2.0/LGPL 2.1
#
# The contents of this file are subject to the Mozilla Public License Version
# 1.1 (the "License"); you may not use this file except in compliance with
# the License. You may obtain a copy of the License at
# http://www.mozilla.org/MPL/
#
# Software distributed under the License is distributed on an "AS IS" basis,
# WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License
# for the specific language governing rights and limitations under the
# License.
#
# The Original Code is the Netscape security libraries.
#
# The Initial Developer of the Original Code is
# Netscape Communications Corporation.
# Portions created by the Initial Developer are Copyright (C) 1994-2000
# the Initial Developer. All Rights Reserved.
#

```

```

# Contributor(s):
#
# Alternatively, the contents of this file may be used under the terms of
# either the GNU General
# Public License Version 2 or later (the "GPL"), or
# the GNU Lesser General Public License Version 2.1 or later (the "LGPL"),
# in which case the provisions of the GPL or the LGPL are applicable instead
# of those above. If you wish to allow use of your version of this file only
# under the terms of either the GPL or the LGPL, and not to allow others to
# use your version of this file under the terms of the MPL, indicate your
# decision by deleting the provisions above and replace them with the notice
# and other provisions required by the GPL or the LGPL. If you do not delete
# the provisions above, a recipient may use your version of this file under
# the terms of any one of the MPL, the GPL or the LGPL.
#
# ***** END LICENSE BLOCK *****
CVS_ID "@(#) $RCSfile: certdata.txt,v $ $Revision: 1.63 $ $Date: 2010/04/03 18:58:17 $"

```

```

#
# certdata.txt
#
# This file contains the object definitions for the certs and other
# information "built into" NSS.
#
# Object definitions:
#
# Certificates
#
#
# -- Attribute --      -- type --      -- value --
# CKA_CLASS            CK_OBJECT_CLASS    CKO_CERTIFICATE
# CKA_TOKEN            CK_BBOOL          CK_TRUE
# CKA_PRIVATE          CK_BBOOL          CK_FALSE
# CKA_MODIFIABLE       CK_BBOOL          CK_FALSE
# CKA_LABEL            UTF8              (varies)
# CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE  CKC_X_509
# CKA_SUBJECT          DER+base64        (varies)
# CKA_ID               byte array      (varies)
# CKA_ISSUER           DER+base64        (varies)
# CKA_SERIAL_NUMBER    DER+base64        (varies)
# CKA_VALUE            DER+base64        (varies)
# CKA_NETSCAPE_EMAIL   ASCII7            (unused here)
#
# Trust
#
# -- Attribute --      -- type --      -- value --
# CKA_CLASS            CK_OBJECT_CLASS    CKO_TRUST
# CKA_TOKEN            CK_BBOOL

```

```

    CK_TRUE
# CKA_PRIVATE          CK_BBOOL    CK_FALSE
# CKA_MODIFIABLE      CK_BBOOL    CK_FALSE
# CKA_LABEL           UTF8        (varies)
# CKA_ISSUER          DER+base64   (varies)
# CKA_SERIAL_NUMBER   DER+base64   (varies)
# CKA_CERT_HASH       binary+base64 (varies)
# CKA_EXPIRES         CK_DATE      (not used here)
# CKA_TRUST_DIGITAL_SIGNATURE CK_TRUST    (varies)
# CKA_TRUST_NON_REPUDIATION CK_TRUST    (varies)
# CKA_TRUST_KEY_ENCIPHERMENT CK_TRUST    (varies)
# CKA_TRUST_DATA_ENCIPHERMENT CK_TRUST    (varies)
# CKA_TRUST_KEY_AGREEMENT CK_TRUST    (varies)
# CKA_TRUST_KEY_CERT_SIGN CK_TRUST    (varies)
# CKA_TRUST_CRL_SIGN   CK_TRUST    (varies)
# CKA_TRUST_SERVER_AUTH CK_TRUST    (varies)
# CKA_TRUST_CLIENT_AUTH CK_TRUST    (varies)
#
# CKA_TRUST_CODE_SIGNING CK_TRUST    (varies)
# CKA_TRUST_EMAIL_PROTECTION CK_TRUST    (varies)
# CKA_TRUST_IPSEC_END_SYSTEM CK_TRUST    (varies)
# CKA_TRUST_IPSEC_TUNNEL CK_TRUST    (varies)
# CKA_TRUST_IPSEC_USER CK_TRUST    (varies)
# CKA_TRUST_TIME_STAMPING CK_TRUST    (varies)
# CKA_TRUST_STEP_UP_APPROVED CK_BBOOL    (varies)
# (other trust attributes can be defined)
#
#
# The object to tell NSS that this is a root list and we don't
# have to go looking for others.
#
BEGINDATA
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_BUILTIN_ROOT_LIST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Mozilla Builtin Roots"
#
# Certificate "GTE CyberTrust Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GTE CyberTrust Root CA"
CKA_CERTIFICATE_TYPE

```

CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\030\060\026\006\003\125\004\012\023\017\107\124\105\040\103\157
\162\160\157\162\141\164\151\157\156\061\034\060\032\006\003\125
\004\003\023\023\107\124\105\040\103\171\142\145\162\124\162\165
\163\164\040\122\157\157\164

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\030\060\026\006\003\125\004\012\023\017\107\124\105\040\103\157
\162\160\157\162\141\164\151\157\156\061\034\060\032\006\003\125
\004\003\023\023\107\124\105\040\103\171\142\145\162\124\162\165
\163\164\040\122\157\157\164

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\002\001\243

END

CKA_VALUE MULTILINE_OCTAL

\060\202\001\372\060\202\001\143\002\002\001\243\060\015\006\011
\052\206\110\206\367\015\001\001\004\005\000\060\105\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\030\060\026\006\003
\125\004\012\023\017\107\124\105\040\103\157\162\160\157\162\141
\164\151\157\156\061\034\060\032\006\003\125\004\003\023\023\107
\124\105\040\103\171\142\145\162\124\162\165\163\164\040\122\157
\157\164\060\036\027\015\071\066\060\062\062\063\062\063\060\061
\060\060\132\027\015\060\066\060\062\062\063\062\063\065\071\060
\060\132\060\105\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\030\060\026\006\003\125\004\012\023\017\107\124\105\040
\103\157\162\160\157\162\141\164\151\157\156\061\034\060\032\006
\003\125\004\003\023\023\107\124\105\040\103\171\142\145\162\124
\162\165\163\164\040\122\157\157\164\060\201\237\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\201\215\000\060
\201\211\002\201\201\000\270\346\117\272\333\230\174\161\174\257
\104\267\323\017\106\331\144\345\223\301\102\216\307\272\111\215
\065\055\172\347\213\275\345\005\061\131\306\261\057\012\014\373
\237\247\077\242\011\146\204\126\036\067\051\033\207\351\176\014
\312\232\237\245\177\365\025\224\243\325\242\106\202\330\150\114
\321\067\025\006\150\257\275\370\260\263\360\051\365\225\132\011
\026\141\167\012\042\045\324\117\105\252\307\275\345\226\337\371
\324\250\216\102\314\044\300\036\221\047\112\265\155\006\200\143
\071\304\242\136\070\003\002\003\001\000\001\060\015\006\011\052
\206\110\206\367\015\001\001\004\005\000\003\201\201\000\022\263
\165\306\137\035\341\141\125\200\000\324\201\113\173\061\017\043
\143\347\075\363\003\371\364\066\250\273\331\343\245\227\115\352
\053\051\340\326\152\163\201\346\300\211\243\323\361\340\245\245
\042\067\232\143\302\110\040\264\333\162\343\310\366\331\174\276


```
\261\257\123\332\024\264\041\270\326\325\226\343\376\116\014\131
\142\266\232\112\371\102\335\214\157\201\251\161\377\364\012\162
\155\155\104\016\235\363\164\164\250\325\064\111\351\136\236\351
\264\172\341\345\132\037\204\060\234\323\237\245\045\330
END
```

```
#
```

```
Trust for Certificate "GTE CyberTrust Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE
CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GTE CyberTrust Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\220\336\336\236\114\116\237\157\330\206\027\127\235\323\221\274
\145\246\211\144
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\304\327\360\262\243\305\175\141\147\360\004\315\103\323\272\130
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\030\060\026\006\003\125\004\012\023\017\107\124\105\040\103\157
\162\160\157\162\141\164\151\157\156\061\034\060\032\006\003\125
\004\003\023\023\107\124\105\040\103\171\142\145\162\124\162\165
\163\164\040\122\157\157\164
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\002\001\243
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "GTE CyberTrust Global Root"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL
CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GTE CyberTrust Global Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\165\061\013\060\011\006\003\125\004\006\023\002\125\123\061
```

\030\060\026\006\003\125\004\012\023\017\107\124\105\040\103\157
\162\160\157\162\141\164\151\157\156\061\047\060\045\006\003\125
\004\013\023\036\107\124\105\040\103\171\142\145\162\124\162\165
\163\164\040\123\157\154\165\164\151\157\156\163\054\040\111\156
\143\056\061\043\060\041\006\003\125\004\003\023\032\107\124\105
\040\103\171\142\145\162\124\162\165\163\164\040\107\154\157\142
\141\154\040\122\157\157\164

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\165\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\030\060\026\006\003\125\004\012\023\017\107\124\105\040\103\157
\162\160\157\162\141\164\151\157\156\061\047\060\045\006\003\125
\004\013\023\036\107\124\105\040\103\171\142\145\162\124\162\165
\163\164\040\123\157\154\165\164\151\157\156\163\054\040\111\156
\143\056\061\043\060\041\006\003\125\004\003\023\032\107\124\105
\040\103\171\142\145\162\124\162\165\163\164\040\107\154\157\142
\141\154\040\122\157\157\164

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\002\001\245

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\132\060\202\001\303\002\002\001\245\060\015\006\011
\052\206\110\206\367\015\001\001\004\005\000\060\165\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\030\060\026\006\003
\125\004\012\023\017\107\124\105\040\103\157\162\160\157\162\141
\164\151\157\156\061\047\060\045\006\003\125\004\013\023\036\107
\124\105\040\103\171\142\145\162\124\162\165\163\164\040\123\157
\154\165\164\151\157\156\163\054\040\111\156\143\056\061\043\060
\041\006\003\125\004\003\023\032\107\124\105\040\103\171\142\145
\162\124\162\165\163\164\040\107\154\157\142\141\154\040\122\157
\157\164\060\036\027\015\071\070\060\070\061\063\060\060\062\071
\060\060\132\027\015\061\070\060\070\061\063\062\063\065\071\060
\060\132\060\165\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\030\060\026\006\003\125\004\012\023\017\107\124\105\040
\103\157\162\160\157\162\141\164\151\157\156\061\047\060\045\006
\003\125\004\013\023\036\107\124\105\040\103\171\142\145\162\124
\162\165\163\164\040\123\157\154\165\164\151\157\156\163\054\040
\111\156\143\056\061\043\060\041\006\003\125\004\003\023\032\107
\124\105\040\103\171\142\145\162\124\162\165\163\164\040\107\154
\157\142\141\154\040\122\157\157\164\060\201\237\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\201\215\000\060
\201\211\002\201\201\000\225\017\240\266\360\120\234\350\172\307
\210\315\335\027\016\056\260\224\320\033\075\016\366\224\300\212
\224\307\006\310\220\227\310\270\144\032\172\176\154\074\123\341
\067\050\163\140\177\262\227\123\007\237\123\371\155\130\224\322

```
\257\215\155\210\147\200\346\355\262\225\317\162\061\312\245\034
\162\272\134\002\347\144\102\347\371\251\054\326\072\015\254\215
\102\252\044\001\071\346\234\077\001\205\127\015\130\207\105\370
\323\205\252\223\151\046\205\160\110\200\077\022\025\307\171\264
\037\005\057\073\142\231\002\003\001\000\001\060\015\006\011\052
\206\110\206\367\015\001\001\004\005\000\003\201\201\000\155\353
\033\011\351\136\331\121\333\147\042\141\244\052\074\110\167\343
\240\174\246\336\163\242\024\003\205\075\373\253\016\060\305\203
\026\063\201\023\010\236\173\064\116\337\100\310\164\327\271\175
\334\364\166\125\175\233\143\124\030\351\360\352\363\134\261\331
\213\102\036\271\300\225\116\272\372\325\342\174\365\150\141\277
\216\354\005\227\137\133\260\327\243\205\064\304\044\247\015\017
\225\223\357\313\224\330\236\037\235\134\205\155\307\252\256\117
\037\042\265\315\225\255\272\247\314\371\253\013\172\177
```

END

#

Trust for Certificate "GTE CyberTrust Global Root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "GTE CyberTrust Global Root"

CKA_CERT_SHA1_HASH

MULTILINE_OCTAL

```
\227\201\171\120\330\034\226\160\314\064\330\011\317\171\104\061
\066\176\364\164
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\312\075\323\150\361\003\134\320\062\372\270\053\131\350\132\333
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\165\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\030\060\026\006\003\125\004\012\023\017\107\124\105\040\103\157
\162\160\157\162\141\164\151\157\156\061\047\060\045\006\003\125
\004\013\023\036\107\124\105\040\103\171\142\145\162\124\162\165
\163\164\040\123\157\154\165\164\151\157\156\163\054\040\111\156
\143\056\061\043\060\041\006\003\125\004\003\023\032\107\124\105
\040\103\171\142\145\162\124\162\165\163\164\040\107\154\157\142
\141\154\040\122\157\157\164
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\002\001\245
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED

CK_BBOOL CK_FALSE

#

Certificate "Thawte Personal Freemail CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Thawte Personal Freemail CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\321\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\032\060\030\006
\003\125\004\012\023\021\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\044\060\042\006\003\125\004\003\023\033\124\150\141\167
\164\145\040\120\145\162\163\157\156\141\154\040\106\162\145\145
\155\141\151\154\040\103\101\061\053\060\051\006\011\052\206\110
\206\367\015\001\011\001\026\034\160\145\162\163\157\156\141\154
\055\146\162\145\145\155\141\151\154\100\164\150\141\167\164\145
\056\143\157\155

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\321\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\032\060\030\006
\003\125\004\012\023\021\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\044\060\042\006\003\125\004\003\023\033\124\150\141\167
\164\145\040\120\145\162\163\157\156\141\154\040\106\162\145\145
\155\141\151\154\040\103\101\061\053\060\051\006\011\052\206\110
\206\367\015\001\011\001\026\034\160\145\162\163\157\156\141\154
\055\146\162\145\145\155\141\151\154\100\164\150\141\167\164\145
\056\143\157\155

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\055\060\202\002\226\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\201\321\061\013\060\011\006\003\125\004\006\023\002\132\101\061
\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145\162
\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007\023
\011\103\141\160\145\040\124\157\167\156\061\032\060\030\006\003
\125\004\012\023\021\124\150\141\167\164\145\040\103\157\156\163
\165\154\164\151\156\147\061\050\060\046\006\003\125\004\013\023
\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123
\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157\156
\061\044\060\042\006\003\125\004\003\023\033\124\150\141\167\164
\145\040\120\145\162\163\157\156\141\154\040\106\162\145\145\155
\141\151\154\040\103\101\061\053\060\051\006\011\052\206\110\206
\367\015\001\011\001\026\034\160\145\162\163\157\156\141\154\055
\146\162\145\145\155\141\151\154\100\164\150\141\167\164\145\056
\143\157\155\060\036\027\015\071\066\060\061\060\061\060\060\060
\060\060\060\132\027\015\062\060\061\062\063\061\062\063\065\071
\065\071\132\060\201\321\061\013\060\011\006\003\125\004\006\023
\002\132\101\061\025\060\023\006\003\125\004\010\023\014\127\145
\163\164\145\162\156\040\103\141\160\145\061\022\060\020\006\003
\125\004\007\023\011\103\141\160\145\040\124\157\167\156\061\032
\060\030\006\003\125\004\012\023\021\124\150\141\167\164\145\040
\103\157\156\163\165\154\164\151\156\147\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\044\060\042\006\003\125\004\003\023\033\124
\150\141\167\164\145\040\120\145\162\163\157\156\141\154\040\106
\162\145\145\155\141\151\154\040\103\101\061\053\060\051\006\011
\052\206\110\206\367\015\001\011\001\026\034\160\145\162\163\157
\156\141\154\055\146\162\145\145\155\141\151\154\100\164\150\141
\167\164\145\056\143\157\155\060\201\237\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\201\215\000\060\201\211
\002\201\201\000\324\151\327\324\260\224\144\133\161\351\107\330
\014\121\266\352\162\221\260\204\136\175\055\015\217\173\022\337
\205\045\165\050\164\072\102\054\143\047\237\225\173\113\357\176
\031\207\035\206\352\243\335\271\316\226\144\032\302\024\156\104
\254\174\346\217\350\115\017\161\037\100\070\246\000\243\207\170
\366\371\224\206\136\255\352\300\136\166\353\331\024\243\135\156
\172\174\014\245\113\125\177\006\031\051\177\236\232\046\325\152
\273\070\044\010\152\230\307\261\332\243\230\221\375\171\333\345
\132\304\034\271\002\003\001\000\001\243\023\060\021\060\017\006
\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\015
\006\011\052\206\110\206\367\015\001\001\004\005\000\003\201\201
\000\307\354\222\176\116\370\365\226\245\147\142\052\244\360\115
\021\140\320\157\215\140\130\141\254\046\273\122\065\134\010\317
\060\373\250\112\226\212\037\142\102\043\214\027\017\364\272\144

```
\234\027\254\107\051\337\235\230\136\322\154\140\161\134\242\254
\334\171\343\347\156\000\107\037\265\015\050\350\002\235\344\232
\375\023\364\246\331\174\261\370\334\137\043\046\011\221\200\163
\320\024\033\336\103\251\203\045\362\346\234\057\025\312\376\246
\253\212\007\165\213\014\335\121\204\153\344\370\321\316\167\242
\201
END
```

```
#
```

```
Trust for Certificate "Thawte Personal Freemail CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Thawte Personal Freemail CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\040\231\000\266\075\225\127\050\024\014\321\066\042\330\306\207
\244\353\000\205
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\036\164\303\206\074\014\065\305\076\302\177\357\074\252\074\331
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\321\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\032\060\030\006
\003\125\004\012\023\021\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\044\060\042\006\003\125\004\003\023\033\124\150\141\167
\164\145\040\120\145\162\163\157\156\141\154\040\106\162\145\145
\155\141\151\154\040\103\101\061\053\060\051\006\011\052\206\110
\206\367\015\001\011\001\026\034\160\145\162\163\157\156\141\154
\055\146\162\145\145\155\141\151\154\100\164\150\141\167\164\145
\056\143\157\155
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\000
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```

#
# Certificate "Thawte Server CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Thawte Server CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\304\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006
\003\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\031\060\027\006\003\125\004\003\023\020\124
\150\141\167\164\145\040\123\145\162\166\145\162\040\103\101\061
\046\060\044\006\011\052\206\110\206\367\015\001\011\001\026\027
\163\145\162\166\145\162\055\143\145\162\164\163\100\164\150\141
\167\164\145\056\143\157\155
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\304\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006
\003\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\031\060\027\006\003\125\004\003\023\020\124
\150\141\167\164\145\040\123\145\162\166\145\162\040\103\101\061
\046\060\044\006\011\052\206\110\206\367\015\001\011\001\026\027
\163\145\162\166\145\162\055\143\145\162\164\163\100\164\150\141
\167\164\145\056\143\157\155
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\023\060\202\002\174\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060

```

\201\304\061\013\060\011\006\003\125\004\006\023\002\132\101\061
\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145\162
\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007\023
\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006\003
\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156\163
\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003\125
\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151\163
\151\157\156\061\031\060\027\006\003\125\004\003\023\020\124\150
\141\167\164\145\040\123\145\162\166\145\162\040\103\101\061\046
\060\044\006\011\052\206\110\206\367\015\001\011\001\026\027\163
\145\162\166\145\162\055\143\145\162\164\163\100\164\150\141\167
\164\145\056\143\157\155\060\036\027\015\071\066\060\070\060\061
\060\060\060\060\060\060\132\027\015\062\060\061\062\063\061\062
\063\065\071\065\071\132\060\201\304\061\013\060\011\006\003\125
\004\006\023\002\132\101\061\025\060\023\006\003\125\004\010\023
\014\127\145\163\164\145\162\156\040\103\141\160\145\061\022\060
\020\006\003\125\004\007\023\011\103\141\160\145\040\124\157\167
\156\061\035\060\033\006\003\125\004\012\023\024\124\150\141\167
\164\145\040\103\157\156\163\165\154\164\151\156\147\040\143\143
\061\050\060\046\006\003\125\004\013\023\037\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\123\145\162\166\151\143\145
\163\040\104\151\166\151\163\151\157\156\061\031\060\027\006\003
\125\004\003\023\020\124\150\141\167\164\145\040\123\145\162\166
\145\162\040\103\101\061\046\060\044\006\011\052\206\110\206\367
\015\001\011\001\026\027\163\145\162\166\145\162\055\143\145\162
\164\163\100\164\150\141\167\164\145\056\143\157\155\060\201\237
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\201\215\000\060\201\211\002\201\201\000\323\244\120\156\310\377
\126\153\346\317\135\266\352\014\150\165\107\242\252\302\332\204
\045\374\250\364\107\121\332\205\265\040\164\224\206\036\017\165
\311\351\010\141\365\006\155\060\156\025\031\002\351\122\300\142
\333\115\231\236\342\152\014\104\070\315\376\276\343\144\011\160
\305\376\261\153\051\266\057\111\310\073\324\047\004\045\020\227
\057\347\220\155\300\050\102\231\327\114\103\336\303\365\041\155
\124\237\135\303\130\341\300\344\331\133\260\270\334\264\173\337
\066\072\302\265\146\042\022\326\207\015\002\003\001\000\001\243
\023\060\021\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\015\006\011\052\206\110\206\367\015\001\001
\004\005\000\003\201\201\000\007\372\114\151\134\373\225\314\106
\356\205\203\115\041\060\216\312\331\250\157\111\032\346\332\121
\343\140\160\154\204\141\021\241\032\310\110\076\131\103\175\117
\225\075\241\213\267\013\142\230\172\165\212\335\210\116\116\236
\100\333\250\314\062\164\271\157\015\306\343\263\104\013\331\212
\157\232\051\233\231\030\050\073\321\343\100\050\232\132\074\325
\265\347\040\033\213\312\244\253\215\351\121\331\342\114\054\131
\251\332\271\262\165\033\366\102\362\357\307\362\030\371\211\274
\243\377\212\043\056\160\107

END

#

```
Trust for Certificate "Thawte Server CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Thawte Server CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\043\345\224\224\121\225\362\101\110\003\264\325\144\322\243\243
\365\330\213\214
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\305\160\304\242\355\123\170\014\310\020\123\201\144\313\320\035
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\304\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006
\003\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\031\060\027\006\003\125\004\003\023\020\124
\150\141\167\164\145\040\123\145\162\166\145\162\040\103\101\061
\046\060\044\006\011\052\206\110\206\367\015\001\011\001\026\027
\163\145\162\166\145\162\055\143\145\162\164\163\100\164\150\141
\167\164\145\056\143\157\155
```

END

```
CKA_SERIAL_NUMBER
```

```
MULTILINE_OCTAL
```

```
\002\001\001
```

END

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

#

```
# Certificate "Thawte Premium Server CA"
```

#

```
CKA_CLASS
```

```
CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "Thawte Premium Server CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\316\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006
\003\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\041\060\037\006\003\125\004\003\023\030\124
\150\141\167\164\145\040\120\162\145\155\151\165\155\040\123\145
\162\166\145\162\040\103\101\061\050\060\046\006\011\052\206\110
\206\367\015\001\011\001\026\031\160\162\145\155\151\165\155\055
\163\145\162\166\145\162\100\164\150\141\167\164\145\056\143\157
\155
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\316\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006
\003\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\041\060\037\006\003\125\004\003\023\030\124
\150\141\167\164\145\040\120\162\145\155\151\165\155\040\123\145
\162\166\145\162\040\103\101\061\050\060\046\006\011\052\206\110
\206\367\015\001\011\001\026\031\160\162\145\155\151\165\155\055
\163\145\162\166\145\162\100\164\150\141\167\164\145\056\143\157
\155
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\047\060\202\002\220\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\201\316\061\013\060\011\006\003\125\004\006\023\002\132\101\061
\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145\162
\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007\023
\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006\003
\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156\163
```

\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003\125
\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151\163
\151\157\156\061\041\060\037\006\003\125\004\003\023\030\124\150
\141\167\164\145\040\120\162\145\155\151\165\155\040\123\145\162
\166\145\162\040\103\101\061\050\060\046\006\011\052\206\110\206
\367\015\001\011\001\026\031\160\162\145\155\151\165\155\055\163
\145\162\166\145\162\100\164\150\141\167\164\145\056\143\157\155
\060\036\027\015\071\066\060\070\060\061\060\060\060\060\060\060
\132\027\015\062\060\061\062\063\061\062\063\065\071\065\071\132
\060\201\316\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006
\003\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\041\060\037\006\003\125\004\003\023\030\124
\150\141\167\164\145\040\120\162\145\155\151\165\155\040\123\145
\162\166\145\162\040\103\101\061\050\060\046\006\011\052\206\110
\206\367\015\001\011\001\026\031\160\162\145\155\151\165\155\055
\163\145\162\166\145\162\100\164\150\141\167\164\145\056\143\157
\155\060\201\237\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\201\215\000\060\201\211\002\201\201\000\322\066
\066\152\213\327\302\133\236\332\201\101\142\217\070\356\111\004
\125\326\320\357\034\033\225\026\107\357\030\110\065\072\122\364
\053\152\006\217\073\057\352\126\343\257\206\215\236\027\367\236
\264\145\165\002\115\357\313\011\242\041\121\330\233\320\147\320
\272\015\222\006\024\163\324\223\313\227\052\000\234\134\116\014
\274\372\025\122\374\362\104\156\332\021\112\156\010\237\057\055
\343\371\252\072\206\163\266\106\123\130\310\211\005\275\203\021
\270\163\077\252\007\215\364\102\115\347\100\235\034\067\002\003
\001\000\001\243\023\060\021\060\017\006\003\125\035\023\001\001
\377\004\005\060\003\001\001\377\060\015\006\011\052\206\110\206
\367\015\001\001\004\005\000\003\201\201\000\046\110\054\026\302
\130\372\350\026\164\014\252\252\137\124\077\362\327\311\170\140
\136\136\156\067\143\042\167\066\176\262\027\304\064\271\365\010
\205\374\311\001\070\377\115\276\362\026\102\103\347\273\132\106
\373\301\306\021\037\361\112\260\050\106\311\303\304\102\175\274
\372\253\131\156\325\267\121\210\021\343\244\205\031\153\202\114
\244\014\022\255\351\244\256\077\361\303\111\145\232\214\305\310
\076\045\267\224\231\273\222\062\161\007\360\206\136\355\120\047
\246\015\246\043\371\273\313\246\007\024\102

END

#

```

Trust for Certificate "Thawte Premium Server CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Thawte Premium Server CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\142\177\215\170\047\145\143\231\322\175\177\220\104\311\376\263
\363\076\372\232
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\006\237\151\171\026\146\220\002\033\214\214\242\303\007\157\072
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\316\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\022\060\020\006\003\125\004\007
\023\011\103\141\160\145\040\124\157\167\156\061\035\060\033\006
\003\125\004\012\023\024\124\150\141\167\164\145\040\103\157\156
\163\165\154\164\151\156\147\040\143\143\061\050\060\046\006\003
\125\004\013\023\037\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\123\145\162\166\151\143\145\163\040\104\151\166\151
\163\151\157\156\061\041\060\037\006\003\125\004\003\023\030\124
\150\141\167\164\145\040\120\162\145\155\151\165\155\040\123\145
\162\166\145\162\040\103\101\061\050\060\046\006\011\052\206\110
\206\367\015\001\011\001\026\031\160\162\145\155\151\165\155\055
\163\145\162\166\145\162\100\164\150\141\167\164\145\056\143\157
\155
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
#
Certificate "Equifax Secure CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Equifax Secure CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

```

CKA_SUBJECT MULTILINE_OCTAL

\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\020\060\016\006\003\125\004\012\023\007\105\161\165\151\146\141
\170\061\055\060\053\006\003\125\004\013\023\044\105\161\165\151
\146\141\170\040\123\145\143\165\162\145\040\103\145\162\164\151
\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\020\060\016\006\003\125\004\012\023\007\105\161\165\151\146\141
\170\061\055\060\053\006\003\125\004\013\023\044\105\161\165\151
\146\141\170\040\123\145\143\165\162\145\040\103\145\162\164\151
\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\004\065\336\364\317

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\040\060\202\002\211\240\003\002\001\002\002\004\065
\336\364\317\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\116\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\020\060\016\006\003\125\004\012\023\007\105\161\165\151
\146\141\170\061\055\060\053\006\003\125\004\013\023\044\105\161
\165\151\146\141\170\040\123\145\143\165\162\145\040\103\145\162
\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151
\164\171\060\036\027\015\071\070\060\070\062\062\061\066\064\061
\065\061\132\027\015\061\070\060\070\062\062\061\066\064\061\065
\061\132\060\116\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\020\060\016\006\003\125\004\012\023\007\105\161\165\151
\146\141\170\061\055\060\053\006\003\125\004\013\023\044\105\161
\165\151\146\141\170\040\123\145\143\165\162\145\040\103\145\162
\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151
\164\171\060\201\237\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\201\215\000\060\201\211\002\201\201\000\301
\135\261\130\147\010\142\356\240\232\055\037\010\155\221\024\150
\230\012\036\376\332\004\157\023\204\142\041\303\321\174\316\237
\005\340\270\001\360\116\064\354\342\212\225\004\144\254\361\153
\123\137\005\263\313\147\200\277\102\002\216\376\335\001\011\354
\341\000\024\117\374\373\360\014\335\103\272\133\053\341\037\200
\160\231\025\127\223\026\361\017\227\152\267\302\150\043\034\314
\115\131\060\254\121\036\073\257\053\326\356\143\105\173\305\331
\137\120\322\343\120\017\072\210\347\277\024\375\340\307\271\002
\003\001\000\001\243\202\001\011\060\202\001\005\060\160\006\003
\125\035\037\004\151\060\147\060\145\240\143\240\141\244\137\060
\135\061\013\060\011\006\003\125\004\006\023\002\125\123\061\020
\060\016\006\003\125\004\012\023\007\105\161\165\151\146\141\170

```
\061\055\060\053\006\003\125\004\013\023\044\105\161\165\151\146
\141\170\040\123\145\143\165\162\145\040\103\145\162\164\151\146
\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\061
\015\060\013\006\003\125\004\003\023\004\103\122\114\061\060\032
\006\003\125\035\020\004\023\060\021\201\017\062\060\061\070\060
\070\062\062\061\066\064\061\065\061\132\060\013\006\003\125\035
\017\004\004\003\002\001\006\060\037\006\003\125\035\043\004\030
\060\026\200\024\110\346\150\371\053\322\262\225\327\107\330\043
\040\020\117\063\230\220\237\324\060\035\006\003\125\035\016\004
\026\004\024\110\346\150\371\053\322\262\225\327\107\330\043\040
\020\117\063\230\220\237\324\060\014\006\003\125\035\023\004\005
\060\003\001\001\377\060\032\006\011\052\206\110\206\366\175\007
\101\000\004\015\060\013\033\005\126\063\056\060\143\003\002\006
\300\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\201\201\000\130\316\051\352\374\367\336\265\316\002\271\027
\265\205\321\271\343\340\225\314\045\061\015\000\246\222\156\177
\266\222\143\236\120\225\321\232\157\344\021\336\143\205\156\230
\356\250\377\132\310\323\125\262\146\161\127\336\300\041\353\075
\052\247\043\111\001\004\206\102\173\374\356\177\242\026\122\265
\147\147\323\100\333\073\046\130\262\050\167\075\256\024\167\141
\326\372\052\146\047\240\015\372\247\163\134\352\160\361\224\041
\145\104\137\372\374\357\051\150\251\242\207\171\357\171\357\117
\254\007\167\070
```

END

#

Trust for Certificate "Equifax Secure CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Equifax Secure CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\322\062\011\255\043\323\024\043\041\164\344\015\177\235\142\023
\227\206\143\072
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\147\313\235\300\023\044\212\202\233\262\027\036\321\033\354\324
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\020\060\016\006\003\125\004\012\023\007\105\161\165\151\146\141
\170\061\055\060\053\006\003\125\004\013\023\044\105\161\165\151
\146\141\170\040\123\145\143\165\162\145\040\103\145\162\164\151
\146\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER

```
MULTILINE_OCTAL
\002\004\065\336\364\317
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "Digital Signature Trust Co. Global CA 1"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Digital Signature Trust Co. Global CA 1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\061
END
```

```
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\061
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\066\160\025\226
END
```

```
CKA_VALUE MULTILINE_OCTAL
\060\202\003\051\060\202\002\222\240\003\002\001\002\002\004\066
\160\025\226\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\106\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\044\060\042\006\003\125\004\012\023\033\104\151\147\151
\164\141\154\040\123\151\147\156\141\164\165\162\145\040\124\162
\165\163\164\040\103\157\056\061\021\060\017\006\003\125\004\013
\023\010\104\123\124\103\101\040\105\061\060\036\027\015\071\070
\061\062\061\060\061\070\061\060\062\063\132\027\015\061\070\061
\062\061\060\061\070\064\060\062\063\132\060\106\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\044\060\042\006\003\125
\004\012\023\033\104\151\147\151\164\141\154\040\123\151\147\156
```

\141\164\165\162\145\040\124\162\165\163\164\040\103\157\056\061
\021\060\017\006\003\125\004\013\023\010\104\123\124\103\101\040
\105\061\060\201\235\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\201\213\000\060\201\207\002\201\201\000\240
\154\201\251\317\064\036\044\335\376\206\050\314\336\203\057\371
\136\324\102\322\350\164\140\146\023\230\006\034\251\121\022\151
\157\061\125\271\111\162\000\010\176\323\245\142\104\067\044\231
\217\331\203\110\217\231\155\225\023\273\103\073\056\111\116\210
\067\301\273\130\177\376\341\275\370\273\141\315\363\107\300\231
\246\361\363\221\350\170\174\000\313\141\311\104\047\161\151\125
\112\176\111\115\355\242\243\276\002\114\000\312\002\250\356\001
\002\061\144\017\122\055\023\164\166\066\265\172\264\055\161\002
\001\003\243\202\001\044\060\202\001\040\060\021\006\011\140\206
\110\001\206\370\102\001\001\004\004\003\002\000\007\060\150\006
\003\125\035\037\004\141\060\137\060\135\240\133\240\131\244\127
\060\125\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\061\061\015\060\013\006\003\125\004
\003\023\004\103\122\114\061\060\053\006\003\125\035\020\004\044
\060\042\200\017\061\071\071\070\061\062\061\060\061\070\061\060
\062\063\132\201\017\062\060\061\070\061\062\061\060\061\070\061
\060\062\063\132\060\013\006\003\125\035\017\004\004\003\002\001
\006\060\037\006\003\125\035\043\004\030\060\026\200\024\152\171
\176\221\151\106\030\023\012\002\167\245\131\133\140\230\045\016
\242\370\060\035\006\003\125\035\016\004\026\004\024\152\171\176
\221\151\106\030\023\012\002\167\245\131\133\140\230\045\016\242
\370\060\014\006\003\125\035\023\004\005\060\003\001\001\377\060
\031\006\011\052\206\110\206\366\175\007\101\000\004\014\060\012
\033\004\126\064\056\060\003\002\004\220\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\201\201\000\042\022\330
\172\035\334\201\006\266\011\145\262\207\310\037\136\264\057\351
\304\036\362\074\301\273\004\220\021\112\203\116\176\223\271\115
\102\307\222\046\240\134\064\232\070\162\370\375\153\026\076\040
\356\202\213\061\052\223\066\205\043\210\212\074\003\150\323\311
\011\017\115\374\154\244\332\050\162\223\016\211\200\260\175\376
\200\157\145\155\030\063\227\213\302\153\211\356\140\075\310\233
\357\177\053\062\142\163\223\313\074\343\173\342\166\170\105\274
\241\223\004\273\206\237\072\133\103\172\303\212\145

END

#

Trust for Certificate "Digital Signature Trust Co. Global CA 1"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE


```

CKA_LABEL
UTF8 "Digital Signature Trust Co. Global CA 1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\201\226\213\072\357\034\334\160\365\372\062\151\302\222\243\143
\133\321\043\323
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\045\172\272\203\056\266\242\013\332\376\365\002\017\010\327\255
END
CKA_ISSUER MULTILINE_OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\066\160\025\226
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Digital Signature Trust Co. Global CA 3"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Digital Signature Trust Co. Global CA 3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\062

```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\004\066\156\323\316

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\051\060\202\002\222\240\003\002\001\002\002\004\066
\156\323\316\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\106\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\044\060\042\006\003\125\004\012\023\033\104\151\147\151
\164\141\154\040\123\151\147\156\141\164\165\162\145\040\124\162
\165\163\164\040\103\157\056\061\021\060\017\006\003\125\004\013
\023\010\104\123\124\103\101\040\105\062\060\036\027\015\071\070
\061\062\060\071\061\071\061\067\062\066\132\027\015\061\070\061
\062\060\071\061\071\064\067\062\066\132\060\106\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\044\060\042\006\003\125
\004\012\023\033\104\151\147\151\164\141\154\040\123\151\147\156
\141\164\165\162\145\040\124\162\165\163\164\040\103\157\056\061
\021\060\017\006\003\125\004\013\023\010\104\123\124\103\101\040
\105\062\060\201\235\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\201\213\000\060\201\207\002\201\201\000\277
\223\217\027\222\357\063\023\030\353\020\177\116\026\277\377\006
\217\052\205\274\136\371\044\246\044\210\266\003\267\301\303\137
\003\133\321\157\256\176\102\352\146\043\270\143\203\126\373\050
\055\341\070\213\264\356\250\001\341\316\034\266\210\052\042\106
\205\373\237\247\160\251\107\024\077\316\336\145\360\250\161\367
\117\046\154\214\274\306\265\357\336\111\047\377\110\052\175\350
\115\003\314\307\262\122\306\027\061\023\073\265\115\333\310\304
\366\303\017\044\052\332\014\235\347\221\133\200\315\224\235\002
\001\003\243\202\001\044\060\202\001\040\060\021\006\011\140\206
\110\001\206\370\102\001\001\004\004\003\002\000\007\060\150\006
\003\125\035\037\004\141\060\137\060\135\240\133\240\131\244\127
\060\125\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\062\061\015\060\013\006\003\125\004
\003\023\004\103\122\114\061\060\053\006\003\125\035\020\004\044
\060\042\200\017\061\071\071\070\061\062\060\071\061\071\061\067
\062\066\132\201\017\062\060\061\070\061\062\060\071\061\071\061
\067\062\066\132\060\013\006\003\125\035\017\004\004\003\002\001
\006\060\037\006\003\125\035\043\004\030\060\026\200\024\036\202
\115\050\145\200\074\311\101\156\254\065\056\132\313\336\356\370
\071\133\060\035\006\003\125\035\016\004\026\004\024\036\202\115
\050\145\200\074\311\101\156\254\065\056\132\313\336\356\370\071
\133\060\014\006\003\125\035\023\004\005\060\003\001\001\377\060
\031\006\011\052\206\110\206\366\175\007\101\000\004\014\060\012
\033\004\126\064\056\060\003\002\004\220\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\201\201\000\107\215\203

```
\255\142\362\333\260\236\105\042\005\271\242\326\003\016\070\162
\347\236\374\173\346\223\266\232\245\242\224\310\064\035\221\321
\305\327\364\012\045\017\075\170\201\236\017\261\147\304\220\114
\143\335\136\247\342\272\237\365\367\115\245\061\173\234\051\055
\114\376\144\076\354\266\123\376\352\233\355\202\333\164\165\113
\007\171\156\036\330\031\203\163\336\365\076\320\265\336\347\113
\150\175\103\056\052\040\341\176\240\170\104\236\010\365\230\371
\307\177\033\033\326\006\040\002\130\241\303\242\003
```

END

#

```
Trust for Certificate "Digital Signature Trust Co. Global CA 3"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Digital Signature Trust Co. Global CA 3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\253\110\363\063\333\004\253\271\300\162\332\133\014\301\320\127
\360\066\233\106
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\223\302\216\021\173\324\363\003\031\275\050\165\023\112\105\112
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\106\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\040\103\157\056\061\021\060\017\006\003\125\004\013\023\010
\104\123\124\103\101\040\105\062
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\066\156\323\316
```

END

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

#

```
# Certificate "Verisign Class 1 Public Primary Certification Authority"
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority"
```

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\061\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\061\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\021\000\315\272\177\126\360\337\344\274\124\376\042\254\263
\162\252\125

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\075\060\202\001\246\002\021\000\315\272\177\126\360
\337\344\274\124\376\042\254\263\162\252\125\060\015\006\011\052
\206\110\206\367\015\001\001\002\005\000\060\137\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125
\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\061\067\060\065\006\003\125\004\013\023\056\103\154\141
\163\163\040\061\040\120\165\142\154\151\143\040\120\162\151\155
\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\060\036\027\015\071
\066\060\061\062\071\060\060\060\060\060\060\132\027\015\062\070
\060\070\060\061\062\063\065\071\065\071\132\060\137\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003
\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\061\067\060\065\006\003\125\004\013\023\056\103\154
\141\163\163\040\061\040\120\165\142\154\151\143\040\120\162\151
\155\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\060\201\237\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201
\215\000\060\201\211\002\201\201\000\345\031\277\155\243\126\141
\055\231\110\161\366\147\336\271\215\353\267\236\206\200\012\221
\016\372\070\045\257\106\210\202\345\163\250\240\233\044\135\015
\037\314\145\156\014\260\320\126\204\030\207\232\006\233\020\241

```
\163\337\264\130\071\153\156\301\366\025\325\250\250\077\252\022
\006\215\061\254\177\260\064\327\217\064\147\210\011\315\024\021
\342\116\105\126\151\037\170\002\200\332\334\107\221\051\273\066
\311\143\134\305\340\327\055\207\173\241\267\062\260\173\060\272
\052\057\061\252\356\243\147\332\333\002\003\001\000\001\060\015
\006\011\052\206\110\206\367\015\001\001\002\005\000\003\201\201
\000\114\077\270\213\306\150\337\356\103\063\016\135\351\246\313
\007\204\115\172\063\377\222\033\364\066\255\330\225\042\066\150
\021\154\174\102\314\363\234\056\304\007\077\024\260\017\117\377
\220\222\166\371\342\274\112\351\217\315\240\200\012\367\305\051
\361\202\042\135\270\261\335\201\043\243\173\045\025\106\060\171
\026\370\352\005\113\224\177\035\302\034\310\343\267\364\020\100
\074\023\303\137\037\123\350\110\344\206\264\173\241\065\260\173
\045\272\270\323\216\253\077\070\235\000\064\000\230\363\321\161
\224
END
```

#

Trust for Certificate "Verisign Class 1 Public Primary Certification Authority"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\220\256\242\151\205\377\024\200\114\103\111\122\354\351\140\204
\167\257\125\157
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\227\140\350\127\137\323\120\107\345\103\014\224\066\212\260\142
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\061\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\021\000\315\272\177\126\360\337\344\274\124\376\042\254\263
\162\252\125
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Verisign Class 2 Public Primary Certification Authority"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 2 Public Primary Certification Authority"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\062\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\062\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\055\033\374\112\027\215\243\221\353\347\377\365\213\105
\276\013

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\074\060\202\001\245\002\020\055\033\374\112\027\215
\243\221\353\347\377\365\213\105\276\013\060\015\006\011\052\206
\110\206\367\015\001\001\002\005\000\060\137\061\013\060\011\006
\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004
\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143
\056\061\067\060\065\006\003\125\004\013\023\056\103\154\141\163
\163\040\062\040\120\165\142\154\151\143\040\120\162\151\155\141
\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\060\036\027\015\071\066
\060\061\062\071\060\060\060\060\060\060\132\027\015\062\070\060
\070\060\061\062\063\065\071\065\071\132\060\137\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125

```
\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\061\067\060\065\006\003\125\004\013\023\056\103\154\141
\163\163\040\062\040\120\165\142\154\151\143\040\120\162\151\155
\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\060\201\237\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201\215
\000\060\201\211\002\201\201\000\266\132\213\243\015\152\043\203
\200\153\317\071\207\364\041\023\063\006\114\045\242\355\125\022
\227\305\247\200\271\372\203\301\040\240\372\057\025\015\174\241
\140\153\176\171\054\372\006\017\072\256\366\033\157\261\322\377
\057\050\122\137\203\175\113\304\172\267\370\146\037\200\124\374
\267\302\216\131\112\024\127\106\321\232\223\276\101\221\003\273
\025\200\223\134\353\347\314\010\154\077\076\263\112\374\377\113
\154\043\325\120\202\046\104\031\216\043\303\161\352\031\044\107
\004\236\165\277\310\246\000\037\002\003\001\000\001\060\015\006
\011\052\206\110\206\367\015\001\001\002\005\000\003\201\201\000
\212\033\053\372\071\301\164\327\136\330\031\144\242\130\112\055
\067\340\063\107\017\254\355\367\252\333\036\344\213\006\134\140
\047\312\105\122\316\026\357\077\006\144\347\224\150\174\140\063
\025\021\151\257\235\142\215\243\003\124\153\246\276\345\356\005
\030\140\004\277\102\200\375\320\250\250\036\001\073\367\243\134
\257\243\334\346\046\200\043\074\270\104\164\367\012\256\111\213
\141\170\314\044\277\210\212\247\016\352\163\031\101\375\115\003
\360\210\321\345\170\215\245\052\117\366\227\015\027\167\312\330
END
```

#

Trust for Certificate "Verisign Class 2 Public Primary Certification Authority"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 2 Public Primary Certification Authority"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\147\202\252\340\355\356\342\032\130\071\323\300\315\024\150\012
\117\140\024\052
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\263\234\045\261\303\056\062\123\200\025\060\235\115\002\167\076
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\062\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
```

```

END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\055\033\374\112\027\215\243\221\353\347\377\365\213\105
\276\013
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Verisign Class 3 Public Primary Certification Authority"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 3 Public Primary Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\063\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\063\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\160\272\344\035\020\331\051\064\266\070\312\173\003\314
\272\277
END
CKA_VALUE MULTILINE_OCTAL
\060\202\002\074\060\202\001\245\002\020\160\272\344\035\020\331
\051\064\266\070\312\173\003\314\272\277\060\015\006\011\052\206
\110\206\367\015\001\001\002\005\000\060\137\061\013\060\011\006

```



```
\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004
\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143
\056\061\067\060\065\006\003\125\004\013\023\056\103\154\141\163
\163\040\063\040\120\165\142\154\151\143\040\120\162\151\155\141
\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\060\036\027\015\071\066
\060\061\062\071\060\060\060\060\060\060\132\027\015\062\070\060
\070\060\061\062\063\065\071\065\071\132\060\137\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125
\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\061\067\060\065\006\003\125\004\013\023\056\103\154\141
\163\163\040\063\040\120\165\142\154\151\143\040\120\162\151\155
\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\060\201\237\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201\215
\000\060\201\211\002\201\201\000\311\134\131\236\362\033\212\001
\024\264\020\337\004\100\333\343\127\257\152\105\100\217\204\014
\013\321\063\331\331\021\317\356\002\130\037\045\367\052\250\104
\005\252\354\003\037\170\177\236\223\271\232\000\252\043\175\326
\254\205\242\143\105\307\162\047\314\364\114\306\165\161\322\071
\357\117\102\360\165\337\012\220\306\216\040\157\230\017\370\254
\043\137\160\051\066\244\311\206\347\261\232\040\313\123\245\205
\347\075\276\175\232\376\044\105\063\334\166\025\355\017\242\161
\144\114\145\056\201\150\105\247\002\003\001\000\001\060\015\006
\011\052\206\110\206\367\015\001\001\002\005\000\003\201\201\000
\273\114\022\053\317\054\046\000\117\024\023\335\246\373\374\012
\021\204\214\363\050\034\147\222\057\174\266\305\372\337\360\350
\225\274\035\217\154\054\250\121\314\163\330\244\300\123\360\116
\326\046\300\166\001\127\201\222\136\041\361\321\261\377\347\320
\041\130\315\151\027\343\104\034\234\031\104\071\211\134\334\234
\000\017\126\215\002\231\355\242\220\105\114\344\273\020\244\075
\360\062\003\016\361\316\370\350\311\121\214\346\142\237\346\237
\300\175\267\162\234\311\066\072\153\237\116\250\377\144\015\144
END
```

#

```
Trust for Certificate "Verisign Class 3 Public Primary Certification Authority"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 3 Public Primary Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\164\054\061\222\346\007\344\044\353\105\111\124\053\341\273\305
\076\141\164\342
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\020\374\143\135\366\046\076\015\363\045\276\137\171\315\147\147
```

```

END
CKA_ISSUER MULTILINE_OCTAL
\060\137\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151
\147\156\054\040\111\156\143\056\061\067\060\065\006\003\125\004
\013\023\056\103\154\141\163\163\040\063\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\160\272\344\035\020\331\051\064\266\070\312\173\003\314
\272\277
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Verisign Class 1 Public Primary Certification Authority - G2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\061\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123

```

\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\061\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\114\307\352\252\230\076\161\323\223\020\370\075\072\211
\221\222

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\002\060\202\002\153\002\020\114\307\352\252\230\076
\161\323\223\020\370\075\072\211\221\222\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\060\201\301\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125
\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\061\074\060\072\006\003\125\004\013\023\063\103\154\141
\163\163\040\061\040\120\165\142\154\151\143\040\120\162\151\155
\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107\062
\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040\061
\071\071\070\040\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151
\172\145\144\040\165\163\145\040\157\156\154\171\061\037\060\035
\006\003\125\004\013\023\026\126\145\162\151\123\151\147\156\040
\124\162\165\163\164\040\116\145\164\167\157\162\153\060\036\027
\015\071\070\060\065\061\070\060\060\060\060\060\132\027\015
\062\070\060\070\060\061\062\063\065\071\065\071\132\060\201\301
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027\060
\025\006\003\125\004\012\023\016\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\061\074\060\072\006\003\125\004\013\023
\063\103\154\141\163\163\040\061\040\120\165\142\154\151\143\040
\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040
\055\040\107\062\061\072\060\070\006\003\125\004\013\023\061\050
\143\051\040\061\071\071\070\040\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164
\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171
\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123
\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162

```
\153\060\201\237\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\201\215\000\060\201\211\002\201\201\000\252\320
\272\276\026\055\270\203\324\312\322\017\274\166\061\312\224\330
\035\223\214\126\002\274\331\157\032\157\122\066\156\165\126\012
\125\323\337\103\207\041\021\145\212\176\217\275\041\336\153\062
\077\033\204\064\225\005\235\101\065\353\222\353\226\335\252\131
\077\001\123\155\231\117\355\345\342\052\132\220\301\271\304\246
\025\317\310\105\353\246\135\216\234\076\360\144\044\166\245\315
\253\032\157\266\330\173\121\141\156\246\177\207\310\342\267\345
\064\334\101\210\352\011\100\276\163\222\075\153\347\165\002\003
\001\000\001\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\003\201\201\000\251\117\303\015\307\147\276\054\313\331
\250\315\055\165\347\176\025\236\073\162\353\176\353\134\055\011
\207\326\153\155\140\174\345\256\305\220\043\014\134\112\320\257
\261\135\363\307\266\012\333\340\025\223\015\335\003\274\307\166
\212\265\335\117\303\233\023\165\270\001\300\346\311\133\153\245
\270\211\334\254\244\335\162\355\116\241\367\117\274\006\323\352
\310\144\164\173\302\225\101\234\145\163\130\361\220\232\074\152
\261\230\311\304\207\274\317\105\155\105\342\156\042\077\376\274
\017\061\134\350\362\331
```

END

#

Trust for Certificate "Verisign Class 1 Public Primary Certification Authority - G2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority - G2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\047\076\341\044\127\375\304\371\014\125\350\053\126\026\177\142
\365\062\345\107
```

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

```
\333\043\075\371\151\372\113\271\225\200\104\163\136\175\101\203
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\061\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
```

```
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145  
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164  
\167\157\162\153
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\020\114\307\352\252\230\076\161\323\223\020\370\075\072\211  
\221\222
```

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Verisign Class 2 Public Primary Certification Authority - G2"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 2 Public Primary Certification Authority - G2"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123  
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123  
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125  
\004\013\023\063\103\154\141\163\163\040\062\040\120\165\142\154  
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151  
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151  
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013  
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123  
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040  
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157  
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145  
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164  
\167\157\162\153
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123  
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123  
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125  
\004\013\023\063\103\154\141\163\163\040\062\040\120\165\142\154  
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151  
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151  
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
```

\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\021\000\271\057\140\314\210\237\241\172\106\011\270\133\160
\154\212\257

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\003\060\202\002\154\002\021\000\271\057\140\314\210
\237\241\172\106\011\270\133\160\154\212\257\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\060\201\301\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003
\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\061\074\060\072\006\003\125\004\013\023\063\103\154
\141\163\163\040\062\040\120\165\142\154\151\143\040\120\162\151
\155\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107
\062\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040
\061\071\071\070\040\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\037\060
\035\006\003\125\004\013\023\026\126\145\162\151\123\151\147\156
\040\124\162\165\163\164\040\116\145\164\167\157\162\153\060\036
\027\015\071\070\060\065\061\070\060\060\060\060\060\060\132\027
\015\062\070\060\070\060\061\062\063\065\071\065\071\132\060\201
\301\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027
\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151\147
\156\054\040\111\156\143\056\061\074\060\072\006\003\125\004\013
\023\063\103\154\141\163\163\040\062\040\120\165\142\154\151\143
\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\040\055\040\107\062\061\072\060\070\006\003\125\004\013\023\061
\050\143\051\040\061\071\071\070\040\126\145\162\151\123\151\147
\156\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165
\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154
\171\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151
\123\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157
\162\153\060\201\237\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\201\215\000\060\201\211\002\201\201\000\247
\210\001\041\164\054\347\032\003\360\230\341\227\074\017\041\010
\361\234\333\227\351\232\374\302\004\006\023\276\137\122\310\314
\036\054\022\126\054\270\001\151\054\314\231\037\255\260\226\256
\171\004\362\023\071\301\173\230\272\010\054\350\302\204\023\054

```
\252\151\351\011\364\307\251\002\244\102\302\043\117\112\330\360
\016\242\373\061\154\311\346\157\231\047\007\365\346\364\114\170
\236\155\353\106\206\372\271\206\311\124\362\262\304\257\324\106
\034\132\311\025\060\377\015\154\365\055\016\155\316\177\167\002
\003\001\000\001\060\015\006\011\052\206\110\206\367\015\001\001
\005\005\000\003\201\201\000\162\056\371\177\321\361\161\373\304
\236\366\305\136\121\212\100\230\270\150\370\233\034\203\330\342
\235\275\377\355\241\346\146\352\057\011\364\312\327\352\245\053
\225\366\044\140\206\115\104\056\203\245\304\055\240\323\256\170
\151\157\162\332\154\256\010\360\143\222\067\346\273\304\060\027
\255\167\314\111\065\252\317\330\217\321\276\267\030\226\107\163
\152\124\042\064\144\055\266\026\233\131\133\264\121\131\072\263
\013\024\364\022\337\147\240\364\255\062\144\136\261\106\162\047
\214\022\173\305\104\264\256
```

END

#

Trust for Certificate "Verisign Class 2 Public Primary Certification Authority - G2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 2 Public Primary Certification Authority - G2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\263\352\304\107\166\311\310\034\352\362\235\225\266\314\240\010
\033\147\354\235
```

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

```
\055\273\345\045\323\321\145\202\072\267\016\372\346\353\342\341
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\062\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\021\000\271\057\140\314\210\237\241\172\106\011\270\133\160
```

```
\154\212\257
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "Verisign Class 3 Public Primary Certification Authority - G2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 3 Public Primary Certification Authority - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

```
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\063\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153
```

```
END
```

```
CKA_ID
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\063\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153
```


END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\175\331\376\007\317\250\036\267\020\171\147\373\247\211
\064\306

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\002\060\202\002\153\002\020\175\331\376\007\317\250
\036\267\020\171\147\373\247\211\064\306\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\060\201\301\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125
\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\061\074\060\072\006\003\125\004\013\023\063\103\154\141
\163\163\040\063\040\120\165\142\154\151\143\040\120\162\151\155
\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107\062
\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040\061
\071\071\070\040\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151
\172\145\144\040\165\163\145\040\157\156\154\171\061\037\060\035
\006\003\125\004\013\023\026\126\145\162\151\123\151\147\156\040
\124\162\165\163\164\040\116\145\164\167\157\162\153\060\036\027
\015\071\070\060\065\061\070\060\060\060\060\060\132\027\015
\062\070\060\070\060\061\062\063\065\071\065\071\132\060\201\301
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027\060
\025\006\003\125\004\012\023\016\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\061\074\060\072\006\003\125\004\013\023
\063\103\154\141\163\163\040\063\040\120\165\142\154\151\143\040
\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040
\055\040\107\062\061\072\060\070\006\003\125\004\013\023\061\050
\143\051\040\061\071\071\070\040\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164
\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171
\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123
\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162
\153\060\201\237\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\201\215\000\060\201\211\002\201\201\000\314\136
\321\021\135\134\151\320\253\323\271\152\114\231\037\131\230\060
\216\026\205\040\106\155\107\077\324\205\040\204\341\155\263\370
\244\355\014\361\027\017\073\371\247\371\045\327\301\317\204\143
\362\174\143\317\242\107\362\306\133\063\216\144\100\004\150\301
\200\271\144\034\105\167\307\330\156\365\225\051\074\120\350\064
\327\170\037\250\272\155\103\221\225\217\105\127\136\176\305\373
\312\244\004\353\352\227\067\124\060\157\273\001\107\062\063\315
\334\127\233\144\151\141\370\233\035\034\211\117\134\147\002\003
\001\000\001\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\003\201\201\000\121\115\315\276\134\313\230\031\234\025

```
\262\001\071\170\056\115\017\147\160\160\231\306\020\132\224\244
\123\115\124\155\053\257\015\135\100\213\144\323\327\356\336\126
\141\222\137\246\304\035\020\141\066\323\054\047\074\350\051\011
\271\021\144\164\314\265\163\237\034\110\251\274\141\001\356\342
\027\246\014\343\100\010\073\016\347\353\104\163\052\232\361\151
\222\357\161\024\303\071\254\161\247\221\011\157\344\161\006\263
\272\131\127\046\171\000\366\370\015\242\063\060\050\324\252\130
\240\235\235\151\221\375
```

END

#

Trust for Certificate "Verisign Class 3 Public Primary Certification Authority - G2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 3 Public Primary Certification Authority - G2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\205\067\034\246\345\120\024\075\316\050\003\107\033\336\072\011
\350\370\167\017
```

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

```
\242\063\233\114\164\170\163\324\154\347\301\363\215\313\134\351
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\063\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\020\175\331\376\007\317\250\036\267\020\171\147\373\247\211
\064\306
```

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Verisign Class 4 Public Primary Certification Authority - G2"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 4 Public Primary Certification Authority - G2"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\064\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\064\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\062\210\216\232\322\365\353\023\107\370\177\304\040\067
\045\370

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\002\060\202\002\153\002\020\062\210\216\232\322\365
\353\023\107\370\177\304\040\067\045\370\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\060\201\301\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125
\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\061\074\060\072\006\003\125\004\013\023\063\103\154\141
\163\163\040\064\040\120\165\142\154\151\143\040\120\162\151\155
\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107\062
\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040\061
\071\071\070\040\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151
\172\145\144\040\165\163\145\040\157\156\154\171\061\037\060\035
\006\003\125\004\013\023\026\126\145\162\151\123\151\147\156\040
\124\162\165\163\164\040\116\145\164\167\157\162\153\060\036\027
\015\071\070\060\065\061\070\060\060\060\060\060\060\132\027\015
\062\070\060\070\060\061\062\063\065\071\065\071\132\060\201\301
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027\060
\025\006\003\125\004\012\023\016\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\061\074\060\072\006\003\125\004\013\023
\063\103\154\141\163\163\040\064\040\120\165\142\154\151\143\040
\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040
\055\040\107\062\061\072\060\070\006\003\125\004\013\023\061\050
\143\051\040\061\071\071\070\040\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164
\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171
\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123
\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162
\153\060\201\237\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\201\215\000\060\201\211\002\201\201\000\272\360
\344\317\371\304\256\205\124\271\007\127\371\217\305\177\150\021
\370\304\027\260\104\334\343\060\163\325\052\142\052\270\320\314
\034\355\050\133\176\275\152\334\263\221\044\312\101\142\074\374
\002\001\277\034\026\061\224\005\227\166\156\242\255\275\141\027
\154\116\060\206\360\121\067\052\120\307\250\142\201\334\133\112
\252\301\240\264\156\353\057\345\127\305\261\053\100\160\333\132
\115\241\216\037\275\003\037\330\003\324\217\114\231\161\274\342
\202\314\130\350\230\072\206\323\206\070\363\000\051\037\002\003
\001\000\001\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\003\201\201\000\205\214\022\301\247\271\120\025\172\313
\076\254\270\103\212\334\252\335\024\272\211\201\176\001\074\043
\161\041\210\057\202\334\143\372\002\105\254\105\131\327\052\130
\104\133\267\237\201\073\222\150\075\342\067\044\365\173\154\217
\166\065\226\011\250\131\235\271\316\043\253\164\326\203\375\062
\163\047\330\151\076\103\164\366\256\305\211\232\347\123\174\351
\173\366\113\363\301\145\203\336\215\212\234\074\210\215\071\131

```
\374\252\077\042\215\241\301\146\120\201\162\114\355\042\144\117
\117\312\200\221\266\051
END
```

```
#
```

```
Trust for Certificate "Verisign Class 4 Public Primary Certification Authority - G2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 4 Public Primary Certification Authority - G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\013\167\276\273\313\172\242\107\005\336\314\017\275\152\002\374
\172\275\233\122
END
```

```
CKA_CERT_MD5_HASH
MULTILINE_OCTAL
\046\155\054\031\230\266\160\150\070\120\124\031\354\220\064\140
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\301\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\074\060\072\006\003\125
\004\013\023\063\103\154\141\163\163\040\064\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\062\061\072\060\070\006\003\125\004\013
\023\061\050\143\051\040\061\071\071\070\040\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\062\210\216\232\322\365\353\023\107\370\177\304\040\067
\045\370
END
```

```
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "GlobalSign Root CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GlobalSign Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\127\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\020\060\016\006\003
\125\004\013\023\007\122\157\157\164\040\103\101\061\033\060\031
\006\003\125\004\003\023\022\107\154\157\142\141\154\123\151\147
\156\040\122\157\157\164\040\103\101
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\127\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\020\060\016\006\003
\125\004\013\023\007\122\157\157\164\040\103\101\061\033\060\031
\006\003\125\004\003\023\022\107\154\157\142\141\154\123\151\147
\156\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\013\004\000\000\000\000\001\025\113\132\303\224
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\165\060\202\002\135\240\003\002\001\002\002\013\004
\000\000\000\000\001\025\113\132\303\224\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\060\127\061\013\060\011\006
\003\125\004\006\023\002\102\105\061\031\060\027\006\003\125\004
\012\023\020\107\154\157\142\141\154\123\151\147\156\040\156\166
\055\163\141\061\020\060\016\006\003\125\004\013\023\007\122\157
\157\164\040\103\101\061\033\060\031\006\003\125\004\003\023\022
\107\154\157\142\141\154\123\151\147\156\040\122\157\157\164\040
\103\101\060\036\027\015\071\070\060\071\060\061\061\062\060\060
\060\060\132\027\015\062\070\060\061\062\070\061\062\060\060\060
\060\132\060\127\061\013\060\011\006\003\125\004\006\023\002\102
\105\061\031\060\027\006\003\125\004\012\023\020\107\154\157\142
\141\154\123\151\147\156\040\156\166\055\163\141\061\020\060\016
\006\003\125\004\013\023\007\122\157\157\164\040\103\101\061\033
\060\031\006\003\125\004\003\023\022\107\154\157\142\141\154\123
\151\147\156\040\122\157\157\164\040\103\101\060\202\001\042\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202
\001\017\000\060\202\001\012\002\202\001\001\000\332\016\346\231
\215\316\243\343\117\212\176\373\361\213\203\045\153\352\110\037
\361\052\260\271\225\021\004\275\360\143\321\342\147\146\317\034
\335\317\033\110\053\356\215\211\216\232\257\051\200\145\253\351
```

\307\055\022\313\253\034\114\160\007\241\075\012\060\315\025\215
\117\370\335\324\214\120\025\034\357\120\356\304\056\367\374\351
\122\362\221\175\340\155\325\065\060\216\136\103\163\362\101\351
\325\152\343\262\211\072\126\071\070\157\006\074\210\151\133\052
\115\305\247\124\270\154\211\314\233\371\074\312\345\375\211\365
\022\074\222\170\226\326\334\164\156\223\104\141\321\215\307\106
\262\165\016\206\350\031\212\325\155\154\325\170\026\225\242\351
\310\012\070\353\362\044\023\117\163\124\223\023\205\072\033\274
\036\064\265\213\005\214\271\167\213\261\333\037\040\221\253\011
\123\156\220\316\173\067\164\271\160\107\221\042\121\143\026\171
\256\261\256\101\046\010\310\031\053\321\106\252\110\326\144\052
\327\203\064\377\054\052\301\154\031\103\112\007\205\347\323\174
\366\041\150\357\352\362\122\237\177\223\220\317\002\003\001\000
\001\243\102\060\100\060\016\006\003\125\035\017\001\001\377\004
\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377\004
\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004
\024\140\173\146\032\105\015\227\312\211\120\057\175\004\315\064
\250\377\374\375\113\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\003\202\001\001\000\326\163\347\174\117\166\320
\215\277\354\272\242\276\064\305\050\062\265\174\374\154\234\054
\053\275\011\236\123\277\153\136\252\021\110\266\345\010\243\263
\312\075\141\115\323\106\011\263\076\303\240\343\143\125\033\362
\272\357\255\071\341\103\271\070\243\346\057\212\046\073\357\240
\120\126\371\306\012\375\070\315\304\013\160\121\224\227\230\004
\337\303\137\224\325\025\311\024\101\234\304\135\165\144\025\015
\377\125\060\354\206\217\377\015\357\054\271\143\106\366\252\374
\337\274\151\375\056\022\110\144\232\340\225\360\246\357\051\217
\001\261\025\265\014\035\245\376\151\054\151\044\170\036\263\247
\034\161\142\356\312\310\227\254\027\135\212\302\370\107\206\156
\052\304\126\061\225\320\147\211\205\053\371\154\246\135\106\235
\014\252\202\344\231\121\335\160\267\333\126\075\141\344\152\341
\134\326\366\376\075\336\101\314\007\256\143\122\277\123\123\364
\053\351\307\375\266\367\202\137\205\322\101\030\333\201\263\004
\034\305\037\244\200\157\025\040\311\336\014\210\012\035\326\146
\125\342\374\110\311\051\046\151\340

END

#

Trust for Certificate "GlobalSign Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "GlobalSign Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\261\274\226\213\324\364\235\142\052\250\232\201\362\025\001\122

\244\035\202\234

END

```

CKA_CERT_MD5_HASH MULTILINE_OCTAL
\076\105\122\025\011\121\222\341\267\135\067\237\261\207\051\212
END
CKA_ISSUER MULTILINE_OCTAL
\060\127\061\013\060\011\006\003\125\004\006\023\002\102\105\061
\031\060\027\006\003\125\004\012\023\020\107\154\157\142\141\154
\123\151\147\156\040\156\166\055\163\141\061\020\060\016\006\003
\125\004\013\023\007\122\157\157\164\040\103\101\061\033\060\031
\006\003\125\004\003\023\022\107\154\157\142\141\154\123\151\147
\156\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\013\004\000\000\000\000\001\025\113\132\303\224
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "GlobalSign Root CA - R2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GlobalSign Root CA - R2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157
\142\141\154\123\151\147\156\040\122\157\157\164\040\103\101\040
\055\040\122\062\061\023\060\021\006\003\125\004\012\023\012\107
\154\157\142\141\154\123\151\147\156\061\023\060\021\006\003\125
\004\003\023\012\107\154\157\142\141\154\123\151\147\156
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157
\142\141\154\123\151\147\156\040\122\157\157\164\040\103\101\040
\055\040\122\062\061\023\060\021\006\003\125\004\012\023\012\107
\154\157\142\141\154\123\151\147\156\061\023\060\021\006\003\125
\004\003\023\012\107\154\157\142\141\154\123\151\147\156
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\013\004\000\000\000\000\001\017\206\046\346\015
END

```


CKA_VALUE MULTILINE_OCTAL

\060\202\003\272\060\202\002\242\240\003\002\001\002\002\013\004
\000\000\000\000\001\017\206\046\346\015\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\060\114\061\040\060\036\006
\003\125\004\013\023\027\107\154\157\142\141\154\123\151\147\156
\040\122\157\157\164\040\103\101\040\055\040\122\062\061\023\060
\021\006\003\125\004\012\023\012\107\154\157\142\141\154\123\151
\147\156\061\023\060\021\006\003\125\004\003\023\012\107\154\157
\142\141\154\123\151\147\156\060\036\027\015\060\066\061\062\061
\065\060\070\060\060\060\060\132\027\015\062\061\061\062\061\065
\060\070\060\060\060\060\132\060\114\061\040\060\036\006\003\125
\004\013\023\027\107\154\157\142\141\154\123\151\147\156\040\122
\157\157\164\040\103\101\040\055\040\122\062\061\023\060\021\006
\003\125\004\012\023\012\107\154\157\142\141\154\123\151\147\156
\061\023\060\021\006\003\125\004\003\023\012\107\154\157\142\141
\154\123\151\147\156\060\202\001\042\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001
\012\002\202\001\001\000\246\317\044\016\276\056\157\050\231\105
\102\304\253\076\041\124\233\013\323\177\204\160\372\022\263\313
\277\207\137\306\177\206\323\262\060\134\326\375\255\361\173\334
\345\370\140\226\011\222\020\365\320\123\336\373\173\176\163\210
\254\122\210\173\112\246\312\111\246\136\250\247\214\132\021\274
\172\202\353\276\214\351\263\254\226\045\007\227\112\231\052\007
\057\264\036\167\277\212\017\265\002\174\033\226\270\305\271\072
\054\274\326\022\271\353\131\175\342\320\006\206\137\136\111\152
\265\071\136\210\064\354\274\170\014\010\230\204\154\250\315\113
\264\240\175\014\171\115\360\270\055\313\041\312\325\154\133\175
\341\240\051\204\241\371\323\224\111\313\044\142\221\040\274\335
\013\325\331\314\371\352\047\012\053\163\221\306\235\033\254\310
\313\350\340\240\364\057\220\213\115\373\260\066\033\366\031\172
\205\340\155\362\141\023\210\134\237\340\223\012\121\227\212\132
\316\257\253\325\367\252\011\252\140\275\334\331\137\337\162\251
\140\023\136\000\001\311\112\372\077\244\352\007\003\041\002\216
\202\312\003\302\233\217\002\003\001\000\001\243\201\234\060\201
\231\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001
\006\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001
\001\377\060\035\006\003\125\035\016\004\026\004\024\233\342\007
\127\147\034\036\300\152\006\336\131\264\232\055\337\334\031\206
\056\060\066\006\003\125\035\037\004\057\060\055\060\053\240\051
\240\047\206\045\150\164\164\160\072\057\057\143\162\154\056\147
\154\157\142\141\154\163\151\147\156\056\156\145\164\057\162\157
\157\164\055\162\062\056\143\162\154\060\037\006\003\125\035\043
\004\030\060\026\200\024\233\342\007\127\147\034\036\300\152\006
\336\131\264\232\055\337\334\031\206\056\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\231\201
\123\207\034\150\227\206\221\354\340\112\270\104\013\253\201\254
\047\117\326\301\270\034\103\170\263\014\232\374\352\054\074\156
\141\033\115\113\051\365\237\005\035\046\301\270\351\203\000\142

```
\105\266\251\010\223\271\251\063\113\030\232\302\370\207\210\116
\333\335\161\064\032\301\124\332\106\077\340\323\052\253\155\124
\042\365\072\142\315\040\157\272\051\211\327\335\221\356\323\134
\242\076\241\133\101\365\337\345\144\103\055\351\325\071\253\322
\242\337\267\213\320\300\200\031\034\105\300\055\214\350\370\055
\244\164\126\111\305\005\265\117\025\336\156\104\170\071\207\250
\176\273\363\171\030\221\273\364\157\235\301\360\214\065\214\135
\001\373\303\155\271\357\104\155\171\106\061\176\012\376\251\202
\301\377\357\253\156\040\304\120\311\137\235\115\233\027\214\014
\345\001\311\240\101\152\163\123\372\245\120\264\156\045\017\373
\114\030\364\375\122\331\216\151\261\350\021\017\336\210\330\373
\035\111\367\252\336\225\317\040\170\302\140\022\333\045\100\214
\152\374\176\102\070\100\144\022\367\236\201\341\223\056
END
```

#

Trust for Certificate "GlobalSign Root CA - R2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "GlobalSign Root CA - R2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\165\340\253\266\023\205\022\047\034\004\370\137\335\336\070\344
\267\044\056\376
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\224\024\167\176\076\136\375\217\060\275\101\260\317\347\320\060
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\114\061\040\060\036\006\003\125\004\013\023\027\107\154\157
\142\141\154\123\151\147\156\040\122\157\157\164\040\103\101\040
\055\040\122\062\061\023\060\021\006\003\125\004\012\023\012\107
\154\157\142\141\154\123\151\147\156\061\023\060\021\006\003\125
\004\003\023\012\107\154\157\142\141\154\123\151\147\156
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\013\004\000\000\000\000\001\017\206\046\346\015
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "ValiCert Class 1 VA"

#

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "ValiCert Class 1 VA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\061\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\061\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\002\347\060\202\002\120\002\001\001\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\060\201\273\061\044\060
\042\006\003\125\004\007\023\033\126\141\154\151\103\145\162\164
\040\126\141\154\151\144\141\164\151\157\156\040\116\145\164\167
\157\162\153\061\027\060\025\006\003\125\004\012\023\016\126\141
\154\151\103\145\162\164\054\040\111\156\143\056\061\065\060\063
\006\003\125\004\013\023\054\126\141\154\151\103\145\162\164\040
```

\103\154\141\163\163\040\061\040\120\157\154\151\143\171\040\126
\141\154\151\144\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\061\041\060\037\006\003\125\004\003\023\030\150\164
\164\160\072\057\057\167\167\167\056\166\141\154\151\143\145\162
\164\056\143\157\155\057\061\040\060\036\006\011\052\206\110\206
\367\015\001\011\001\026\021\151\156\146\157\100\166\141\154\151
\143\145\162\164\056\143\157\155\060\036\027\015\071\071\060\066
\062\065\062\062\062\063\064\070\132\027\015\061\071\060\066\062
\065\062\062\062\063\064\070\132\060\201\273\061\044\060\042\006
\003\125\004\007\023\033\126\141\154\151\103\145\162\164\040\126
\141\154\151\144\141\164\151\157\156\040\116\145\164\167\157\162
\153\061\027\060\025\006\003\125\004\012\023\016\126\141\154\151
\103\145\162\164\054\040\111\156\143\056\061\065\060\063\006\003
\125\004\013\023\054\126\141\154\151\103\145\162\164\040\103\154
\141\163\163\040\061\040\120\157\154\151\143\171\040\126\141\154
\151\144\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\041\060\037\006\003\125\004\003\023\030\150\164\164\160
\072\057\057\167\167\167\056\166\141\154\151\143\145\162\164\056
\143\157\155\057\061\040\060\036\006\011\052\206\110\206\367\015
\001\011\001\026\021\151\156\146\157\100\166\141\154\151\143\145
\162\164\056\143\157\155\060\201\237\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\201\215\000\060\201\211\002
\201\201\000\330\131\202\172\211\270\226\272\246\057\150\157\130
\056\247\124\034\006\156\364\352\215\110\274\061\224\027\360\363
\116\274\262\270\065\222\166\260\320\245\245\001\327\000\003\022
\042\031\010\370\377\021\043\233\316\007\365\277\151\032\046\376
\116\351\321\177\235\054\100\035\131\150\156\246\370\130\260\235
\032\217\323\077\361\334\031\006\201\250\016\340\072\335\310\123
\105\011\006\346\017\160\303\372\100\246\016\342\126\005\017\030
\115\374\040\202\321\163\125\164\215\166\162\240\035\235\035\300
\335\077\161\002\003\001\000\001\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\201\201\000\120\150\075\111\364
\054\034\006\224\337\225\140\177\226\173\027\376\117\161\255\144
\310\335\167\322\357\131\125\350\077\350\216\005\052\041\362\007
\322\265\247\122\376\234\261\266\342\133\167\027\100\352\162\326
\043\313\050\201\062\303\000\171\030\354\131\027\211\311\306\152
\036\161\311\375\267\164\245\045\105\151\305\110\253\031\341\105
\212\045\153\031\356\345\273\022\365\177\367\246\215\121\303\360
\235\164\267\251\076\240\245\377\266\111\003\023\332\042\314\355
\161\202\053\231\317\072\267\365\055\162\310

END

#

Trust for Certificate "ValiCert Class 1 VA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE

```

CKA_LABEL UTF8 "ValiCert Class 1 VA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\345\337\164\074\266\001\304\233\230\103\334\253\214\350\152\201
\020\237\344\216
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\145\130\253\025\255\127\154\036\250\247\265\151\254\277\377\353
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\061\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "ValiCert Class 2 VA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "ValiCert Class 2 VA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\062\040\120\157

```

\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\062\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\347\060\202\002\120\002\001\001\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\060\201\273\061\044\060
\042\006\003\125\004\007\023\033\126\141\154\151\103\145\162\164
\040\126\141\154\151\144\141\164\151\157\156\040\116\145\164\167
\157\162\153\061\027\060\025\006\003\125\004\012\023\016\126\141
\154\151\103\145\162\164\054\040\111\156\143\056\061\065\060\063
\006\003\125\004\013\023\054\126\141\154\151\103\145\162\164\040
\103\154\141\163\163\040\062\040\120\157\154\151\143\171\040\126
\141\154\151\144\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\061\041\060\037\006\003\125\004\003\023\030\150\164
\164\160\072\057\057\167\167\167\056\166\141\154\151\143\145\162
\164\056\143\157\155\057\061\040\060\036\006\011\052\206\110\206
\367\015\001\011\001\026\021\151\156\146\157\100\166\141\154\151
\143\145\162\164\056\143\157\155\060\036\027\015\071\071\060\066
\062\066\060\060\061\071\065\064\132\027\015\061\071\060\066\062
\066\060\060\061\071\065\064\132\060\201\273\061\044\060\042\006
\003\125\004\007\023\033\126\141\154\151\103\145\162\164\040\126
\141\154\151\144\141\164\151\157\156\040\116\145\164\167\157\162
\153\061\027\060\025\006\003\125\004\012\023\016\126\141\154\151
\103\145\162\164\054\040\111\156\143\056\061\065\060\063\006\003
\125\004\013\023\054\126\141\154\151\103\145\162\164\040\103\154

\141\163\163\040\062\040\120\157\154\151\143\171\040\126\141\154
\151\144\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\041\060\037\006\003\125\004\003\023\030\150\164\164\160
\072\057\057\167\167\167\056\166\141\154\151\143\145\162\164\056
\143\157\155\057\061\040\060\036\006\011\052\206\110\206\367\015
\001\011\001\026\021\151\156\146\157\100\166\141\154\151\143\145
\162\164\056\143\157\155\060\201\237\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\201\215\000\060\201\211\002
\201\201\000\316\072\161\312\345\253\310\131\222\125\327\253\330
\164\016\371\356\331\366\125\107\131\145\107\016\005\125\334\353
\230\066\074\134\123\135\323\060\317\070\354\275\101\211\355\045
\102\011\044\153\012\136\263\174\335\122\055\114\346\324\326\175
\132\131\251\145\324\111\023\055\044\115\034\120\157\265\301\205
\124\073\376\161\344\323\134\102\371\200\340\221\032\012\133\071
\066\147\363\077\125\174\033\077\264\137\144\163\064\343\264\022
\277\207\144\370\332\022\377\067\047\301\263\103\273\357\173\156
\056\151\367\002\003\001\000\001\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\201\201\000\073\177\120\157\157
\120\224\231\111\142\070\070\037\113\370\245\310\076\247\202\201
\366\053\307\350\305\316\350\072\020\202\313\030\000\216\115\275
\250\130\177\241\171\000\265\273\351\215\257\101\331\017\064\356
\041\201\031\240\062\111\050\364\304\216\126\325\122\063\375\120
\325\176\231\154\003\344\311\114\374\313\154\253\146\263\112\041
\214\345\265\014\062\076\020\262\314\154\241\334\232\230\114\002
\133\363\316\271\236\245\162\016\112\267\077\074\346\026\150\370
\276\355\164\114\274\133\325\142\037\103\335

END

#

Trust for Certificate "ValiCert Class 2 VA"

CKA_CLASS CK_OBJECT_CLASS

CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "ValiCert Class 2 VA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\061\172\052\320\177\053\063\136\365\241\303\116\113\127\350\267
\330\361\374\246

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\251\043\165\233\272\111\066\156\061\302\333\362\347\146\272\207

END

CKA_ISSUER MULTILINE_OCTAL

\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156

```
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\062\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\001
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "RSA Root Certificate 1"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "RSA Root Certificate 1"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\063\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
```


\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\063\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\347\060\202\002\120\002\001\001\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\060\201\273\061\044\060
\042\006\003\125\004\007\023\033\126\141\154\151\103\145\162\164
\040\126\141\154\151\144\141\164\151\157\156\040\116\145\164\167
\157\162\153\061\027\060\025\006\003\125\004\012\023\016\126\141
\154\151\103\145\162\164\054\040\111\156\143\056\061\065\060\063
\006\003\125\004\013\023\054\126\141\154\151\103\145\162\164\040
\103\154\141\163\163\040\063\040\120\157\154\151\143\171\040\126
\141\154\151\144\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\061\041\060\037\006\003\125\004\003\023\030\150\164
\164\160\072\057\057\167\167\167\056\166\141\154\151\143\145\162
\164\056\143\157\155\057\061\040\060\036\006\011\052\206\110\206
\367\015\001\011\001\026\021\151\156\146\157\100\166\141\154\151
\143\145\162\164\056\143\157\155\060\036\027\015\071\071\060\066
\062\066\060\060\062\062\063\063\132\027\015\061\071\060\066\062
\066\060\060\062\062\063\063\132\060\201\273\061\044\060\042\006
\003\125\004\007\023\033\126\141\154\151\103\145\162\164\040\126
\141\154\151\144\141\164\151\157\156\040\116\145\164\167\157\162
\153\061\027\060\025\006\003\125\004\012\023\016\126\141\154\151
\103\145\162\164\054\040\111\156\143\056\061\065\060\063\006\003
\125\004\013\023\054\126\141\154\151\103\145\162\164\040\103\154
\141\163\163\040\063\040\120\157\154\151\143\171\040\126\141\154
\151\144\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\041\060\037\006\003\125\004\003\023\030\150\164\164\160
\072\057\057\167\167\167\056\166\141\154\151\143\145\162\164\056
\143\157\155\057\061\040\060\036\006\011\052\206\110\206\367\015
\001\011\001\026\021\151\156\146\157\100\166\141\154\151\143\145
\162\164\056\143\157\155\060\201\237\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\201\215\000\060\201\211\002
\201\201\000\343\230\121\226\034\350\325\261\006\201\152\127\303
\162\165\223\253\317\236\246\374\363\026\122\326\055\115\237\065
\104\250\056\004\115\007\111\212\070\051\365\167\067\347\267\253
\135\337\066\161\024\231\217\334\302\222\361\347\140\222\227\354
\330\110\334\277\301\002\040\306\044\244\050\114\060\132\166\155

```
\261\134\363\335\336\236\020\161\241\210\307\133\233\101\155\312
\260\270\216\025\356\255\063\053\317\107\004\134\165\161\012\230
\044\230\051\247\111\131\245\335\370\267\103\142\141\363\323\342
\320\125\077\002\003\001\000\001\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\201\201\000\126\273\002\130\204
\147\010\054\337\037\333\173\111\063\365\323\147\235\364\264\012
\020\263\311\305\054\342\222\152\161\170\047\362\160\203\102\323
\076\317\251\124\364\361\330\222\026\214\321\004\313\113\253\311
\237\105\256\074\212\251\260\161\063\135\310\305\127\337\257\250
\065\263\177\211\207\351\350\045\222\270\177\205\172\256\326\274
\036\067\130\052\147\311\221\317\052\201\076\355\306\071\337\300
\076\031\234\031\314\023\115\202\101\265\214\336\340\075\140\010
\040\017\105\176\153\242\177\243\214\025\356
```

END

#

Trust for Certificate "RSA Root Certificate 1"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "RSA Root Certificate 1"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\151\275\214\364\234\323\000\373\131\056\027\223\312\125\152\363
\354\252\065\373
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\242\157\123\267\356\100\333\112\150\347\372\030\331\020\113\162
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\273\061\044\060\042\006\003\125\004\007\023\033\126\141
\154\151\103\145\162\164\040\126\141\154\151\144\141\164\151\157
\156\040\116\145\164\167\157\162\153\061\027\060\025\006\003\125
\004\012\023\016\126\141\154\151\103\145\162\164\054\040\111\156
\143\056\061\065\060\063\006\003\125\004\013\023\054\126\141\154
\151\103\145\162\164\040\103\154\141\163\163\040\063\040\120\157
\154\151\143\171\040\126\141\154\151\144\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\041\060\037\006\003\125
\004\003\023\030\150\164\164\160\072\057\057\167\167\167\056\166
\141\154\151\143\145\162\164\056\143\157\155\057\061\040\060\036
\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156\146
\157\100\166\141\154\151\143\145\162\164\056\143\157\155
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\001
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL
CK_FALSE
```

```
#
```

```
# Certificate "Verisign Class 1 Public Primary Certification Authority - G3"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority - G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\061\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
```

```
END
```

```
CKA_ID
```

```
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\061\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
```

```
END
```

```
CKA_SERIAL_NUMBER
```

MULTILINE_OCTAL

\002\021\000\213\133\165\126\204\124\205\013\000\317\257\070\110
\316\261\244

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\032\060\202\003\002\002\021\000\213\133\165\126\204
\124\205\013\000\317\257\070\110\316\261\244\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\060\201\312\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003
\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153\061\072\060\070\006\003\125\004\013\023\061\050
\143\051\040\061\071\071\071\040\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164
\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171
\061\105\060\103\006\003\125\004\003\023\074\126\145\162\151\123
\151\147\156\040\103\154\141\163\163\040\061\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\063\060\036\027\015\071\071\061\060\060
\061\060\060\060\060\060\060\132\027\015\063\066\060\067\061\066
\062\063\065\071\065\071\132\060\201\312\061\013\060\011\006\003
\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004\012
\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143\056
\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123
\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162
\153\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040
\061\071\071\071\040\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\105\060
\103\006\003\125\004\003\023\074\126\145\162\151\123\151\147\156
\040\103\154\141\163\163\040\061\040\120\165\142\154\151\143\040
\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040
\055\040\107\063\060\202\001\042\060\015\006\011\052\206\110\206
\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012
\002\202\001\001\000\335\204\324\271\264\371\247\330\363\004\170
\234\336\075\334\154\023\026\331\172\335\044\121\146\300\307\046
\131\015\254\006\010\302\224\321\063\037\360\203\065\037\156\033
\310\336\252\156\025\116\124\047\357\304\155\032\354\013\343\016
\360\104\245\127\307\100\130\036\243\107\037\161\354\140\366\155
\224\310\030\071\355\376\102\030\126\337\344\114\111\020\170\116
\001\166\065\143\022\066\335\146\274\001\004\066\243\125\150\325
\242\066\011\254\253\041\046\124\006\255\077\312\024\340\254\312
\255\006\035\225\342\370\235\361\340\140\377\302\177\165\053\114
\314\332\376\207\231\041\352\272\376\076\124\327\322\131\170\333
\074\156\317\240\023\000\032\270\047\241\344\276\147\226\312\240

\305\263\234\335\311\165\236\353\060\232\137\243\315\331\256\170
\031\077\043\351\134\333\051\275\255\125\310\033\124\214\143\366
\350\246\352\307\067\022\134\243\051\036\002\331\333\037\073\264
\327\017\126\107\201\025\004\112\257\203\047\321\305\130\210\301
\335\366\252\247\243\030\332\150\252\155\021\121\341\277\145\153
\237\226\166\321\075\002\003\001\000\001\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\253\146
\215\327\263\272\307\232\266\346\125\320\005\361\237\061\215\132
\252\331\252\106\046\017\161\355\245\255\123\126\142\001\107\052
\104\351\376\077\164\013\023\233\271\364\115\033\262\321\137\262
\266\322\210\134\263\237\315\313\324\247\331\140\225\204\072\370
\301\067\035\141\312\347\260\305\345\221\332\124\246\254\061\201
\256\227\336\315\010\254\270\300\227\200\177\156\162\244\347\151
\023\225\145\037\304\223\074\375\171\217\004\324\076\117\352\367
\236\316\315\147\174\117\145\002\377\221\205\124\163\307\377\066
\367\206\055\354\320\136\117\377\021\237\162\006\326\270\032\361
\114\015\046\145\342\104\200\036\307\237\343\335\350\012\332\354
\245\040\200\151\150\241\117\176\341\153\317\007\101\372\203\216
\274\070\335\260\056\021\261\153\262\102\314\232\274\371\110\042
\171\112\031\017\262\034\076\040\164\331\152\303\276\362\050\170
\023\126\171\117\155\120\352\033\260\265\127\261\067\146\130\043
\363\334\017\337\012\207\304\357\206\005\325\070\024\140\231\243
\113\336\006\226\161\054\362\333\266\037\244\357\077\356
END

#

Trust for Certificate "Verisign Class 1 Public Primary Certification Authority - G3"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 1 Public Primary Certification Authority - G3"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\040\102\205\334\367\353\166\101\225\127\216\023\153\324\267\321
\351\216\106\245

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\261\107\274\030\127\321\030\240\170\055\354\161\350\052\225\163
END

CKA_ISSUER

MULTILINE_OCTAL

\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106

```
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\061\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\021\000\213\133\165\126\204\124\205\013\000\317\257\070\110
\316\261\244
```

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Verisign Class 2 Public Primary Certification Authority - G3"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 2 Public Primary Certification Authority - G3"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\062\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
```

\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\062\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\141\160\313\111\214\137\230\105\051\347\260\246\331\120
\133\172

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\031\060\202\003\001\002\020\141\160\313\111\214\137
\230\105\051\347\260\246\331\120\133\172\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\060\201\312\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125
\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\061\037\060\035\006\003\125\004\013\023\026\126\145\162
\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164\167
\157\162\153\061\072\060\070\006\003\125\004\013\023\061\050\143
\051\040\061\071\071\071\040\126\145\162\151\123\151\147\156\054
\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164\150
\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171\061
\105\060\103\006\003\125\004\003\023\074\126\145\162\151\123\151
\147\156\040\103\154\141\163\163\040\062\040\120\165\142\154\151
\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\040\055\040\107\063\060\036\027\015\071\071\061\060\060\061
\060\060\060\060\060\060\132\027\015\063\066\060\067\061\066\062
\063\065\071\065\071\132\060\201\312\061\013\060\011\006\003\125
\004\006\023\002\125\123\061\027\060\025\006\003\125\004\012\023
\016\126\145\162\151\123\151\147\156\054\040\111\156\143\056\061
\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123\151
\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162\153
\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040\061
\071\071\071\040\126\145\162\151\123\151\147\156\054\040\111\156
\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151
\172\145\144\040\165\163\145\040\157\156\154\171\061\105\060\103
\006\003\125\004\003\023\074\126\145\162\151\123\151\147\156\040
\103\154\141\163\163\040\062\040\120\165\142\154\151\143\040\120
\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040\055
\040\107\063\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002

\202\001\001\000\257\012\015\302\325\054\333\147\271\055\345\224
\047\335\245\276\340\260\115\217\263\141\126\074\326\174\303\364
\315\076\206\313\242\210\342\341\330\244\151\305\265\342\277\301
\246\107\120\136\106\071\213\325\226\272\265\157\024\277\020\316
\047\023\236\005\107\233\061\172\023\330\037\331\323\002\067\213
\255\054\107\360\216\201\006\247\015\060\014\353\367\074\017\040
\035\334\162\106\356\245\002\310\133\303\311\126\151\114\305\030
\301\221\173\013\325\023\000\233\274\357\303\110\076\106\140\040
\205\052\325\220\266\315\213\240\314\062\335\267\375\100\125\262
\120\034\126\256\314\215\167\115\307\040\115\247\061\166\357\150
\222\212\220\036\010\201\126\262\255\151\243\122\320\313\034\304
\043\075\037\231\376\114\350\026\143\216\306\010\216\366\061\366
\322\372\345\166\335\265\034\222\243\111\315\315\001\315\150\315
\251\151\272\243\353\035\015\234\244\040\246\301\240\305\321\106
\114\027\155\322\254\146\077\226\214\340\204\324\066\377\042\131
\305\371\021\140\250\137\004\175\362\032\366\045\102\141\017\304
\112\270\076\211\002\003\001\000\001\060\015\006\011\052\206\110
\206\367\015\001\001\005\005\000\003\202\001\001\000\064\046\025
\074\300\215\115\103\111\035\275\351\041\222\327\146\234\267\336
\305\270\320\344\135\137\166\042\300\046\371\204\072\072\371\214
\265\373\354\140\361\350\316\004\260\310\335\247\003\217\060\363
\230\337\244\346\244\061\337\323\034\013\106\334\162\040\077\256
\356\005\074\244\063\077\013\071\254\160\170\163\113\231\053\337
\060\302\124\260\250\073\125\241\376\026\050\315\102\275\164\156
\200\333\047\104\247\316\104\135\324\033\220\230\015\036\102\224
\261\000\054\004\320\164\243\002\005\042\143\143\315\203\265\373
\301\155\142\153\151\165\375\135\160\101\271\365\277\174\337\276
\301\062\163\042\041\213\130\201\173\025\221\172\272\343\144\110
\260\177\373\066\045\332\225\320\361\044\024\027\335\030\200\153
\106\043\071\124\365\216\142\011\004\035\224\220\246\233\346\045
\342\102\105\252\270\220\255\276\010\217\251\013\102\030\224\317
\162\071\341\261\103\340\050\317\267\347\132\154\023\153\111\263
\377\343\030\174\211\213\063\135\254\063\327\247\371\332\072\125
\311\130\020\371\252\357\132\266\317\113\113\337\052

END

#

Trust for Certificate "Verisign Class 2 Public Primary Certification Authority - G3"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL

UTF8 "Verisign Class 2 Public Primary Certification Authority - G3"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\141\357\103\327\177\312\324\141\121\274\230\340\303\131\022\257

\237\353\143\021

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL
\370\276\304\143\042\311\250\106\164\213\270\035\036\112\053\366
END

CKA_ISSUER MULTILINE_OCTAL
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\062\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
END

CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\141\160\313\111\214\137\230\105\051\347\260\246\331\120
\133\172
END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

Certificate "Verisign Class 3 Public Primary Certification Authority - G3"

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 3 Public Primary Certification Authority - G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL

\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040

\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\021\000\233\176\006\111\243\076\142\271\325\356\220\110\161
\051\357\127

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\032\060\202\003\002\002\021\000\233\176\006\111\243
\076\142\271\325\356\220\110\161\051\357\127\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\060\201\312\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003
\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153\061\072\060\070\006\003\125\004\013\023\061\050
\143\051\040\061\071\071\071\040\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164
\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171
\061\105\060\103\006\003\125\004\003\023\074\126\145\162\151\123
\151\147\156\040\103\154\141\163\163\040\063\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\063\060\036\027\015\071\071\061\060\060
\061\060\060\060\060\060\060\132\027\015\063\066\060\067\061\066
\062\063\065\071\065\071\132\060\201\312\061\013\060\011\006\003
\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004\012
\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143\056
\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123

\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162
\153\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040
\061\071\071\071\040\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\105\060
\103\006\003\125\004\003\023\074\126\145\162\151\123\151\147\156
\040\103\154\141\163\163\040\063\040\120\165\142\154\151\143\040
\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040
\055\040\107\063\060\202\001\042\060\015\006\011\052\206\110\206
\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012
\002\202\001\001\000\313\272\234\122\374\170\037\032\036\157\033
\067\163\275\370\311\153\224\022\060\117\360\066\107\365\320\221
\012\365\027\310\245\141\301\026\100\115\373\212\141\220\345\166
\040\301\021\006\175\253\054\156\246\365\021\101\216\372\055\255
\052\141\131\244\147\046\114\320\350\274\122\133\160\040\004\130
\321\172\311\244\151\274\203\027\144\255\005\213\274\320\130\316
\215\214\365\353\360\102\111\013\235\227\047\147\062\156\341\256
\223\025\034\160\274\040\115\057\030\336\222\210\350\154\205\127
\021\032\351\176\343\046\021\124\242\105\226\125\203\312\060\211
\350\334\330\243\355\052\200\077\177\171\145\127\076\025\040\146
\010\057\225\223\277\252\107\057\250\106\227\360\022\342\376\302
\012\053\121\346\166\346\267\106\267\342\015\246\314\250\303\114
\131\125\211\346\350\123\134\034\352\235\360\142\026\013\247\311
\137\014\360\336\302\166\316\257\367\152\362\372\101\246\242\063
\024\311\345\172\143\323\236\142\067\325\205\145\236\016\346\123
\044\164\033\136\035\022\123\133\307\054\347\203\111\073\025\256
\212\150\271\127\227\002\003\001\000\001\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\021\024
\226\301\253\222\010\367\077\057\311\262\376\344\132\237\144\336
\333\041\117\206\231\064\166\066\127\335\320\025\057\305\255\177
\025\037\067\142\163\076\324\347\137\316\027\003\333\065\372\053
\333\256\140\011\137\036\137\217\156\273\013\075\352\132\023\036
\014\140\157\265\300\265\043\042\056\007\013\313\251\164\313\107
\273\035\301\327\245\153\314\057\322\102\375\111\335\247\211\317
\123\272\332\000\132\050\277\202\337\370\272\023\035\120\206\202
\375\216\060\217\051\106\260\036\075\065\332\070\142\026\030\112
\255\346\266\121\154\336\257\142\353\001\320\036\044\376\172\217
\022\032\022\150\270\373\146\231\024\024\105\134\256\347\256\151
\027\201\053\132\067\311\136\052\364\306\342\241\134\124\233\246
\124\000\317\360\361\301\307\230\060\032\073\066\026\333\243\156
\352\375\255\262\302\332\357\002\107\023\212\300\361\263\061\255
\117\034\341\117\234\257\017\014\235\367\170\015\330\364\065\126
\200\332\267\155\027\217\235\036\201\144\341\376\305\105\272\255
\153\271\012\172\116\117\113\204\356\113\361\175\335\021

END

#

```

Trust for Certificate "Verisign Class 3 Public Primary Certification Authority - G3"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign Class 3 Public Primary Certification Authority - G3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\023\055\015\105\123\113\151\227\315\262\325\303\071\342\125\166
\140\233\134\306
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\315\150\266\247\307\304\316\165\340\035\117\127\104\141\222\011
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\021\000\233\176\006\111\243\076\142\271\325\356\220\110\161
\051\357\127
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Verisign Class 4 Public Primary Certification Authority - G3"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Verisign
Class 4 Public Primary Certification Authority - G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

```

CKA_SUBJECT MULTILINE_OCTAL

\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\064\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\064\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\021\000\354\240\247\213\156\165\152\001\317\304\174\314\057
\224\136\327

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\032\060\202\003\002\002\021\000\354\240\247\213\156
\165\152\001\317\304\174\314\057\224\136\327\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\060\201\312\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006\003
\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\061\037\060\035\006\003\125\004\013\023\026\126\145
\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145\164
\167\157\162\153\061\072\060\070\006\003\125\004\013\023\061\050
\143\051\040\061\071\071\071\040\126\145\162\151\123\151\147\156
\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165\164
\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154\171

\061\105\060\103\006\003\125\004\003\023\074\126\145\162\151\123
\151\147\156\040\103\154\141\163\163\040\064\040\120\165\142\154
\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\055\040\107\063\060\036\027\015\071\071\061\060\060
\061\060\060\060\060\060\060\132\027\015\063\066\060\067\061\066
\062\063\065\071\065\071\132\060\201\312\061\013\060\011\006\003
\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004\012
\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143\056
\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151\123
\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157\162
\153\061\072\060\070\006\003\125\004\013\023\061\050\143\051\040
\061\071\071\071\040\126\145\162\151\123\151\147\156\054\040\111
\156\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162
\151\172\145\144\040\165\163\145\040\157\156\154\171\061\105\060
\103\006\003\125\004\003\023\074\126\145\162\151\123\151\147\156
\040\103\154\141\163\163\040\064\040\120\165\142\154\151\143\040
\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040
\055\040\107\063\060\202\001\042\060\015\006\011\052\206\110\206
\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012
\002\202\001\001\000\255\313\245\021\151\306\131\253\361\217\265
\031\017\126\316\314\265\037\040\344\236\046\045\113\340\163\145
\211\131\336\320\203\344\365\017\265\273\255\361\174\350\041\374
\344\350\014\356\174\105\042\031\166\222\264\023\267\040\133\011
\372\141\256\250\362\245\215\205\302\052\326\336\146\066\322\233
\002\364\250\222\140\174\234\151\264\217\044\036\320\206\122\366
\062\234\101\130\036\042\275\315\105\142\225\010\156\320\146\335
\123\242\314\360\020\334\124\163\213\004\241\106\063\063\134\027
\100\271\236\115\323\363\276\125\203\350\261\211\216\132\174\232
\226\042\220\073\210\045\362\322\123\210\002\014\013\170\362\346
\067\027\113\060\106\007\344\200\155\246\330\226\056\350\054\370
\021\263\070\015\146\246\233\352\311\043\133\333\216\342\363\023
\216\032\131\055\252\002\360\354\244\207\146\334\301\077\365\330
\271\364\354\202\306\322\075\225\035\345\300\117\204\311\331\243
\104\050\006\152\327\105\254\360\153\152\357\116\137\370\021\202
\036\070\143\064\146\120\324\076\223\163\372\060\303\146\255\377
\223\055\227\357\003\002\003\001\000\001\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\217\372
\045\153\117\133\344\244\116\047\125\253\042\025\131\074\312\265
\012\324\112\333\253\335\241\137\123\305\240\127\071\302\316\107
\053\276\072\310\126\277\302\331\047\020\072\261\005\074\300\167
\061\273\072\323\005\173\155\232\034\060\214\200\313\223\223\052
\203\253\005\121\202\002\000\021\147\153\363\210\141\107\137\003
\223\325\133\015\340\361\324\241\062\065\205\262\072\333\260\202
\253\321\313\012\274\117\214\133\305\113\000\073\037\052\202\246
\176\066\205\334\176\074\147\000\265\344\073\122\340\250\353\135
\025\371\306\155\360\255\035\016\205\267\251\232\163\024\132\133

```
\217\101\050\300\325\350\055\115\244\136\315\252\331\355\316\334
\330\325\074\102\035\027\301\022\135\105\070\303\070\363\374\205
\056\203\106\110\262\327\040\137\222\066\217\347\171\017\230\136
\231\350\360\320\244\273\365\123\275\052\316\131\260\257\156\177
\154\273\322\036\000\260\041\355\370\101\142\202\271\330\262\304
\273\106\120\363\061\305\217\001\250\164\353\365\170\047\332\347
\367\146\103\363\236\203\076\040\252\303\065\140\221\316
END
```

#

Trust for Certificate "Verisign Class 4 Public Primary Certification Authority - G3"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Verisign Class 4 Public Primary Certification Authority - G3"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\310\354\214\207\222\151\313\113\253\071\351\215\176\127\147\363
\024\225\163\235
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\333\310\362\047\056\261\352\152\051\043\135\376\126\076\063\337
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\061\071\071\071\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\064\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\063
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\021\000\354\240\247\213\156\165\152\001\317\304\174\314\057
\224\136\327
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED

CK_BBOOL CK_FALSE

#

Certificate "Entrust.net Secure Server CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Entrust.net Secure Server CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\303\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\105\156\164\162\165
\163\164\056\156\145\164\061\073\060\071\006\003\125\004\013\023
\062\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164
\057\103\120\123\040\151\156\143\157\162\160\056\040\142\171\040
\162\145\146\056\040\050\154\151\155\151\164\163\040\154\151\141
\142\056\051\061\045\060\043\006\003\125\004\013\023\034\050\143
\051\040\061\071\071\071\040\105\156\164\162\165\163\164\056\156
\145\164\040\114\151\155\151\164\145\144\061\072\060\070\006\003
\125\004\003\023\061\105\156\164\162\165\163\164\056\156\145\164
\040\123\145\143\165\162\145\040\123\145\162\166\145\162\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\303\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\105\156\164\162\165
\163\164\056\156\145\164\061\073\060\071\006\003\125\004\013\023
\062\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164
\057\103\120\123\040\151\156\143\157\162\160\056\040\142\171\040
\162\145\146\056\040\050\154\151\155\151\164\163\040\154\151\141
\142\056\051\061\045\060\043\006\003\125\004\013\023\034\050\143
\051\040\061\071\071\071\040\105\156\164\162\165\163\164\056\156
\145\164\040\114\151\155\151\164\145\144\061\072\060\070\006\003
\125\004\003\023\061\105\156\164\162\165\163\164\056\156\145\164
\040\123\145\143\165\162\145\040\123\145\162\166\145\162\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\004\067\112\322\103

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\330\060\202\004\101\240\003\002\001\002\002\004\067
\112\322\103\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\201\303\061\013\060\011\006\003\125\004\006\023\002
\125\123\061\024\060\022\006\003\125\004\012\023\013\105\156\164
\162\165\163\164\056\156\145\164\061\073\060\071\006\003\125\004
\013\023\062\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\120\123\040\151\156\143\157\162\160\056\040\142
\171\040\162\145\146\056\040\050\154\151\155\151\164\163\040\154
\151\141\142\056\051\061\045\060\043\006\003\125\004\013\023\034
\050\143\051\040\061\071\071\071\040\105\156\164\162\165\163\164
\056\156\145\164\040\114\151\155\151\164\145\144\061\072\060\070
\006\003\125\004\003\023\061\105\156\164\162\165\163\164\056\156
\145\164\040\123\145\143\165\162\145\040\123\145\162\166\145\162
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\060\036\027\015\071\071\060\065
\062\065\061\066\060\071\064\060\132\027\015\061\071\060\065\062
\065\061\066\063\071\064\060\132\060\201\303\061\013\060\011\006
\003\125\004\006\023\002\125\123\061\024\060\022\006\003\125\004
\012\023\013\105\156\164\162\165\163\164\056\156\145\164\061\073
\060\071\006\003\125\004\013\023\062\167\167\167\056\145\156\164
\162\165\163\164\056\156\145\164\057\103\120\123\040\151\156\143
\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\061\071\071\071\040\105
\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164
\145\144\061\072\060\070\006\003\125\004\003\023\061\105\156\164
\162\165\163\164\056\156\145\164\040\123\145\143\165\162\145\040
\123\145\162\166\145\162\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\201
\235\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\201\213\000\060\201\207\002\201\201\000\315\050\203\064\124
\033\211\363\017\257\067\221\061\377\257\061\140\311\250\350\262
\020\150\355\237\347\223\066\361\012\144\273\107\365\004\027\077
\043\107\115\305\047\031\201\046\014\124\162\015\210\055\331\037
\232\022\237\274\263\161\323\200\031\077\107\146\173\214\065\050
\322\271\012\337\044\332\234\326\120\171\201\172\132\323\067\367
\302\112\330\051\222\046\144\321\344\230\154\072\000\212\365\064
\233\145\370\355\343\020\377\375\270\111\130\334\240\336\202\071
\153\201\261\026\031\141\271\124\266\346\103\002\001\003\243\202
\001\327\060\202\001\323\060\021\006\011\140\206\110\001\206\370
\102\001\001\004\004\003\002\000\007\060\202\001\031\006\003\125
\035\037\004\202\001\020\060\202\001\014\060\201\336\240\201\333
\240\201\330\244\201\325\060\201\322\061\013\060\011\006\003\125
\004\006\023\002\125\123\061\024\060\022\006\003\125\004\012\023
\013\105\156\164\162\165\163\164\056\156\145\164\061\073\060\071
\006\003\125\004\013\023\062\167\167\167\056\145\156\164\162\165
\163\164\056\156\145\164\057\103\120\123\040\151\156\143\157\162
\160\056\040\142\171\040\162\145\146\056\040\050\154\151\155\151

\164\163\040\154\151\141\142\056\051\061\045\060\043\006\003\125
\004\013\023\034\050\143\051\040\061\071\071\071\040\105\156\164
\162\165\163\164\056\156\145\164\040\114\151\155\151\164\145\144
\061\072\060\070\006\003\125\004\003\023\061\105\156\164\162\165
\163\164\056\156\145\164\040\123\145\143\165\162\145\040\123\145
\162\166\145\162\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\061\015\060\013
\006\003\125\004\003\023\004\103\122\114\061\060\051\240\047\240
\045\206\043\150\164\164\160\072\057\057\167\167\167\056\145\156
\164\162\165\163\164\056\156\145\164\057\103\122\114\057\156\145
\164\061\056\143\162\154\060\053\006\003\125\035\020\004\044\060
\042\200\017\061\071\071\071\060\065\062\065\061\066\060\071\064
\060\132\201\017\062\060\061\071\060\065\062\065\061\066\060\071
\064\060\132\060\013\006\003\125\035\017\004\004\003\002\001\006
\060\037\006\003\125\035\043\004\030\060\026\200\024\360\027\142
\023\125\075\263\377\012\000\153\373\120\204\227\363\355\142\320
\032\060\035\006\003\125\035\016\004\026\004\024\360\027\142\023
\125\075\263\377\012\000\153\373\120\204\227\363\355\142\320\032
\060\014\006\003\125\035\023\004\005\060\003\001\001\377\060\031
\006\011\052\206\110\206\366\175\007\101\000\004\014\060\012\033
\004\126\064\056\060\003\002\004\220\060\015\006\011\052\206\110
\206\367\015\001\001\005\005\000\003\201\201\000\220\334\060\002
\372\144\164\302\247\012\245\174\041\215\064\027\250\373\107\016
\377\045\174\215\023\012\373\344\230\265\357\214\370\305\020\015
\367\222\276\361\303\325\325\225\152\004\273\054\316\046\066\145
\310\061\306\347\356\077\343\127\165\204\172\021\357\106\117\030
\364\323\230\273\250\207\062\272\162\366\074\342\075\237\327\035
\331\303\140\103\214\130\016\042\226\057\142\243\054\037\272\255
\005\357\253\062\170\207\240\124\163\031\265\134\005\371\122\076
\155\055\105\013\367\012\223\352\355\006\371\262
END

#

Trust for Certificate "Entrust.net Secure Server CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Entrust.net Secure Server CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\231\246\233\346\032\376\210\153\115\053\202\000\174\270\124\374
\061\176\025\071
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\337\362\200\163\314\361\346\141\163\374\365\102\351\305\174\356
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\303\061\013\060\011\006\003\125\004\006\023\002\125\123

```
\061\024\060\022\006\003\125\004\012\023\013\105\156\164\162\165
\163\164\056\156\145\164\061\073\060\071\006\003\125\004\013\023
\062\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164
\057\103\120\123\040\151\156\143\157\162\160\056\040\142\171\040
\162\145\146\056\040\050\154\151\155\151\164\163\040\154\151\141
\142\056\051\061\045\060\043\006\003\125\004\013\023\034\050\143
\051\040\061\071\071\071\040\105\156\164\162\165\163\164\056\156
\145\164\040\114\151\155\151\164\145\144\061\072\060\070\006\003
\125\004\003\023\061\105\156\164\162\165\163\164\056\156\145\164
\040\123\145\143\165\162\145\040\123\145\162\166\145\162\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\004\067\112\322\103
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Entrust.net Secure Personal CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Entrust.net Secure Personal CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE

CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\201\311\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\105\156\164\162\165
\163\164\056\156\145\164\061\110\060\106\006\003\125\004\013\024
\077\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164
\057\103\154\151\145\156\164\137\103\101\137\111\156\146\157\057
\103\120\123\040\151\156\143\157\162\160\056\040\142\171\040\162
\145\146\056\040\154\151\155\151\164\163\040\154\151\141\142\056
\061\045\060\043\006\003\125\004\013\023\034\050\143\051\040\061
\071\071\071\040\105\156\164\162\165\163\164\056\156\145\164\040
\114\151\155\151\164\145\144\061\063\060\061\006\003\125\004\003
\023\052\105\156\164\162\165\163\164\056\156\145\164\040\103\154
\151\145\156\164\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171
```

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\311\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\105\156\164\162\165
\163\164\056\156\145\164\061\110\060\106\006\003\125\004\013\024
\077\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164
\057\103\154\151\145\156\164\137\103\101\137\111\156\146\157\057
\103\120\123\040\151\156\143\157\162\160\056\040\142\171\040\162
\145\146\056\040\154\151\155\151\164\163\040\154\151\141\142\056
\061\045\060\043\006\003\125\004\013\023\034\050\143\051\040\061
\071\071\071\040\105\156\164\162\165\163\164\056\156\145\164\040
\114\151\155\151\164\145\144\061\063\060\061\006\003\125\004\003
\023\052\105\156\164\162\165\163\164\056\156\145\164\040\103\154
\151\145\156\164\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\004\070\003\221\356

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\355\060\202\004\126\240\003\002\001\002\002\004\070
\003\221\356\060\015\006\011\052\206\110\206\367\015\001\001\004
\005\000\060\201\311\061\013\060\011\006\003\125\004\006\023\002
\125\123\061\024\060\022\006\003\125\004\012\023\013\105\156\164
\162\165\163\164\056\156\145\164\061\110\060\106\006\003\125\004
\013\024\077\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\154\151\145\156\164\137\103\101\137\111\156\146
\157\057\103\120\123\040\151\156\143\157\162\160\056\040\142\171
\040\162\145\146\056\040\154\151\155\151\164\163\040\154\151\141
\142\056\061\045\060\043\006\003\125\004\013\023\034\050\143\051
\040\061\071\071\071\040\105\156\164\162\165\163\164\056\156\145
\164\040\114\151\155\151\164\145\144\061\063\060\061\006\003\125
\004\003\023\052\105\156\164\162\165\163\164\056\156\145\164\040
\103\154\151\145\156\164\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\036
\027\015\071\071\061\060\061\062\061\071\062\064\063\060\132\027
\015\061\071\061\060\061\062\061\071\065\064\063\060\132\060\201
\311\061\013\060\011\006\003\125\004\006\023\002\125\123\061\024
\060\022\006\003\125\004\012\023\013\105\156\164\162\165\163\164
\056\156\145\164\061\110\060\106\006\003\125\004\013\024\077\167
\167\167\056\145\156\164\162\165\163\164\056\156\145\164\057\103
\154\151\145\156\164\137\103\101\137\111\156\146\157\057\103\120
\123\040\151\156\143\157\162\160\056\040\142\171\040\162\145\146
\056\040\154\151\155\151\164\163\040\154\151\141\142\056\061\045
\060\043\006\003\125\004\013\023\034\050\143\051\040\061\071\071
\071\040\105\156\164\162\165\163\164\056\156\145\164\040\114\151
\155\151\164\145\144\061\063\060\061\006\003\125\004\003\023\052
\105\156\164\162\165\163\164\056\156\145\164\040\103\154\151\145

\156\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\060\201\235\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\201\213\000
\060\201\207\002\201\201\000\310\072\231\136\061\027\337\254\047
\157\220\173\344\031\377\105\243\064\302\333\301\250\117\360\150
\352\204\375\237\165\171\317\301\212\121\224\257\307\127\003\107
\144\236\255\202\033\132\332\177\067\170\107\273\067\230\022\226
\316\306\023\175\357\322\014\060\121\251\071\236\125\370\373\261
\347\060\336\203\262\272\076\361\325\211\073\073\205\272\252\164
\054\376\077\061\156\257\221\225\156\006\324\007\115\113\054\126
\107\030\004\122\332\016\020\223\277\143\220\233\341\337\214\346
\002\244\346\117\136\367\213\002\001\003\243\202\001\340\060\202
\001\334\060\021\006\011\140\206\110\001\206\370\102\001\001\004
\004\003\002\000\007\060\202\001\042\006\003\125\035\037\004\202
\001\031\060\202\001\025\060\201\344\240\201\341\240\201\336\244
\201\333\060\201\330\061\013\060\011\006\003\125\004\006\023\002
\125\123\061\024\060\022\006\003\125\004\012\023\013\105\156\164
\162\165\163\164\056\156\145\164\061\110\060\106\006\003\125\004
\013\024\077\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\154\151\145\156\164\137\103\101\137\111\156\146
\157\057\103\120\123\040\151\156\143\157\162\160\056\040\142\171
\040\162\145\146\056\040\154\151\155\151\164\163\040\154\151\141
\142\056\061\045\060\043\006\003\125\004\013\023\034\050\143\051
\040\061\071\071\071\040\105\156\164\162\165\163\164\056\156\145
\164\040\114\151\155\151\164\145\144\061\063\060\061\006\003\125
\004\003\023\052\105\156\164\162\165\163\164\056\156\145\164\040
\103\154\151\145\156\164\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\015
\060\013\006\003\125\004\003\023\004\103\122\114\061\060\054\240
\052\240\050\206\046\150\164\164\160\072\057\057\167\167\167\056
\145\156\164\162\165\163\164\056\156\145\164\057\103\122\114\057
\103\154\151\145\156\164\061\056\143\162\154\060\053\006\003\125
\035\020\004\044\060\042\200\017\061\071\071\071\061\060\061\062
\061\071\062\064\063\060\132\201\017\062\060\061\071\061\060\061
\062\061\071\062\064\063\060\132\060\013\006\003\125\035\017\004
\004\003\002\001\006\060\037\006\003\125\035\043\004\030\060\026
\200\024\304\373\234\051\173\227\315\114\226\374\356\133\263\312
\231\164\213\225\352\114\060\035\006\003\125\035\016\004\026\004
\024\304\373\234\051\173\227\315\114\226\374\356\133\263\312\231
\164\213\225\352\114\060\014\006\003\125\035\023\004\005\060\003
\001\001\377\060\031\006\011\052\206\110\206\366\175\007\101\000
\004\014\060\012\033\004\126\064\056\060\003\002\004\220\060\015
\006\011\052\206\110\206\367\015\001\001\004\005\000\003\201\201
\000\077\256\212\361\327\146\003\005\236\076\372\352\034\106\273
\244\133\217\170\232\022\110\231\371\364\065\336\014\066\007\002
\153\020\072\211\024\201\234\061\246\174\262\101\262\152\347\007
\001\241\113\371\237\045\073\226\312\231\303\076\241\121\034\363
\303\056\104\367\260\147\106\252\222\345\073\332\034\031\024\070

```
\060\325\342\242\061\045\056\361\354\105\070\355\370\006\130\003
\163\142\260\020\061\217\100\277\144\340\134\076\305\117\037\332
\022\103\377\114\346\006\046\250\233\031\252\104\074\166\262\134
\354
END
```

```
#
```

```
Trust for Certificate
```

```
"Entrust.net Secure Personal CA"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "Entrust.net Secure Personal CA"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\332\171\301\161\021\120\302\064\071\252\053\013\014\142\375\125
\262\371\365\200
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

```
\014\101\057\023\133\240\124\365\226\146\055\176\315\016\003\364
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\201\311\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\105\156\164\162\165
\163\164\056\156\145\164\061\110\060\106\006\003\125\004\013\024
\077\167\167\167\056\145\156\164\162\165\163\164\056\156\145\164
\057\103\154\151\145\156\164\137\103\101\137\111\156\146\157\057
\103\120\123\040\151\156\143\157\162\160\056\040\142\171\040\162
\145\146\056\040\154\151\155\151\164\163\040\154\151\141\142\056
\061\045\060\043\006\003\125\004\013\023\034\050\143\051\040\061
\071\071\071\040\105\156\164\162\165\163\164\056\156\145\164\040
\114\151\155\151\164\145\144\061\063\060\061\006\003\125\004\003
\023\052\105\156\164\162\165\163\164\056\156\145\164\040\103\154
\151\145\156\164\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171
```

```
END
```

```
CKA_SERIAL_NUMBER
```

```
MULTILINE_OCTAL
```

```
\002\004\070\003\221\356
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
```

```
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "Entrust.net Premium 2048 Secure Server CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Entrust.net Premium 2048 Secure Server CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125
\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056
\156\145\164\057\103\120\123\137\062\060\064\070\040\151\156\143
\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\061\071\071\071\040\105
\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164
\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164
\162\165\163\164\056\156\145\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\040\050\062\060\064\070\051
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125
\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056
\156\145\164\057\103\120\123\137\062\060\064\070\040\151\156\143
\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\061\071\071\071\040\105
\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164
\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164
\162\165\163\164\056\156\145\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\040\050\062\060\064\070\051
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\070\143\271\146
END
CKA_VALUE MULTILINE_OCTAL
\060\202\004\134\060\202\003\104\240\003\002\001\002\002\004\070
\143\271\146\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\201\264\061\024\060\022\006\003\125\004\012\023\013
\105\156\164\162\165\163\164\056\156\145\164\061\100\060\076\006
\003\125\004\013\024\067\167\167\167\056\145\156\164\162\165\163
\164\056\156\145\164\057\103\120\123\137\062\060\064\070\040\151
\156\143\157\162\160\056\040\142\171\040\162\145\146\056\040\050
```

\154\151\155\151\164\163\040\154\151\141\142\056\051\061\045\060
\043\006\003\125\004\013\023\034\050\143\051\040\061\071\071\071
\040\105\156\164\162\165\163\164\056\156\145\164\040\114\151\155
\151\164\145\144\061\063\060\061\006\003\125\004\003\023\052\105
\156\164\162\165\163\164\056\156\145\164\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\050\062\060\064\070\051\060\036\027\015\071\071\061
\062\062\064\061\067\065\060\065\061\132\027\015\061\071\061\062
\062\064\061\070\062\060\065\061\132\060\201\264\061\024\060\022
\006\003\125\004\012\023\013\105\156\164\162\165\163\164\056\156
\145\164\061\100\060\076\006\003\125\004\013\024\067\167\167\167
\056\145\156\164\162\165\163\164\056\156\145\164\057\103\120\123
\137\062\060\064\070\040\151\156\143\157\162\160\056\040\142\171
\040\162\145\146\056\040\050\154\151\155\151\164\163\040\154\151
\141\142\056\051\061\045\060\043\006\003\125\004\013\023\034\050
\143\051\040\061\071\071\071\040\105\156\164\162\165\163\164\056
\156\145\164\040\114\151\155\151\164\145\144\061\063\060\061\006
\003\125\004\003\023\052\105\156\164\162\165\163\164\056\156\145
\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\040\050\062\060\064\070\051
\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001
\000\255\115\113\251\022\206\262\352\243\040\007\025\026\144\052
\053\113\321\277\013\112\115\216\355\200\166\245\147\267\170\100
\300\163\102\310\150\300\333\123\053\335\136\270\166\230\065\223
\213\032\235\174\023\072\016\037\133\267\036\317\345\044\024\036
\261\201\251\215\175\270\314\153\113\003\361\002\014\334\253\245
\100\044\000\177\164\224\241\235\010\051\263\210\013\365\207\167
\235\125\315\344\303\176\327\152\144\253\205\024\206\225\133\227
\062\120\157\075\310\272\146\014\343\374\275\270\111\301\166\211
\111\031\375\300\250\275\211\243\147\057\306\237\274\161\031\140
\270\055\351\054\311\220\166\146\173\224\342\257\170\326\145\123
\135\074\326\234\262\317\051\003\371\057\244\120\262\324\110\316
\005\062\125\212\375\262\144\114\016\344\230\007\165\333\177\337
\271\010\125\140\205\060\051\371\173\110\244\151\206\343\065\077
\036\206\135\172\172\025\275\357\000\216\025\042\124\027\000\220
\046\223\274\016\111\150\221\277\370\107\323\235\225\102\301\016
\115\337\157\046\317\303\030\041\142\146\103\160\326\325\300\007
\341\002\003\001\000\001\243\164\060\162\060\021\006\011\140\206
\110\001\206\370\102\001\001\004\004\003\002\000\007\060\037\006
\003\125\035\043\004\030\060\026\200\024\125\344\201\321\021\200
\276\330\211\271\010\243\061\371\241\044\011\026\271\160\060\035
\006\003\125\035\016\004\026\004\024\125\344\201\321\021\200\276
\330\211\271\010\243\061\371\241\044\011\026\271\160\060\035\006
\011\052\206\110\206\366\175\007\101\000\004\020\060\016\033\010
\126\065\056\060\072\064\056\060\003\002\004\220\060\015\006\011
\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000
\131\107\254\041\204\212\027\311\234\211\123\036\272\200\205\032


```
\306\074\116\076\261\234\266\174\306\222\135\030\144\002\343\323
\006\010\021\141\174\143\343\053\235\061\003\160\166\322\243\050
\240\364\273\232\143\163\355\155\345\052\333\355\024\251\053\306
\066\021\320\053\353\007\213\245\332\236\134\031\235\126\022\365
\124\051\310\005\355\262\022\052\215\364\003\033\377\347\222\020
\207\260\072\265\303\235\005\067\022\243\307\364\025\271\325\244
\071\026\233\123\072\043\221\361\250\202\242\152\210\150\301\171
\002\042\274\252\246\326\256\337\260\024\137\270\207\320\335\174
\177\173\377\257\034\317\346\333\007\255\136\333\205\235\320\053
\015\063\333\004\321\346\111\100\023\053\166\373\076\351\234\211
\017\025\316\030\260\205\170\041\117\153\117\016\372\066\147\315
\007\362\377\010\320\342\336\331\277\052\257\270\207\206\041\074
\004\312\267\224\150\177\317\074\351\230\327\070\377\354\300\331
\120\360\056\113\130\256\106\157\320\056\303\140\332\162\125\162
\275\114\105\236\141\272\277\204\201\222\003\321\322\151\174\305
END
```

#

```
Trust for Certificate "Entrust.net Premium 2048 Secure Server CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Entrust.net Premium 2048 Secure Server CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\200\035\142\320\173\104\235\134\134\003\134\230\352\141\372\104
\074\052\130\376
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\272\041\352\040\326\335\333\217\301\127\213\100\255\241\374\374
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125
\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056
\156\145\164\057\103\120\123\137\062\060\064\070\040\151\156\143
\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\061\071\071\071\040\105
\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164
\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164
\162\165\163\164\056\156\145\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\040\050\062\060\064\070\051
```

END

```
CKA_SERIAL_NUMBER
```

```
MULTILINE_OCTAL
\002\004\070\143\271\146
```

```
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "Baltimore CyberTrust Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Baltimore CyberTrust Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\111\105\061
\022\060\020\006\003\125\004\012\023\011\102\141\154\164\151\155
\157\162\145\061\023\060\021\006\003\125\004\013\023\012\103\171
\142\145\162\124\162\165\163\164\061\042\060\040\006\003\125\004
\003\023\031\102\141\154\164\151\155\157\162\145\040\103\171\142
\145\162\124\162\165\163\164\040\122\157\157\164
```

```
END
```

```
CKA_ID
```

```
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\132\061\013\060\011\006\003\125\004\006\023\002\111\105\061
\022\060\020\006\003\125\004\012\023\011\102\141\154\164\151\155
\157\162\145\061\023\060\021\006\003\125\004\013\023\012\103\171
\142\145\162\124\162\165\163\164\061\042\060\040\006\003\125\004
\003\023\031\102\141\154\164\151\155\157\162\145\040\103\171\142
\145\162\124\162\165\163\164\040\122\157\157\164
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

```
\002\004\002\000\000\271
```

```
END
```

```
CKA_VALUE MULTILINE_OCTAL
```

```
\060\202\003\167\060\202\002\137\240\003\002\001\002\002\004\002
\000\000\271\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\132\061\013\060\011\006\003\125\004\006\023\002\111
\105\061\022\060\020\006\003\125\004\012\023\011\102\141\154\164
\151\155\157\162\145\061\023\060\021\006\003\125\004\013\023\012
\103\171\142\145\162\124\162\165\163\164\061\042\060\040\006\003
\125\004\003\023\031\102\141\154\164\151\155\157\162\145\040\103
\171\142\145\162\124\162\165\163\164\040\122\157\157\164\060\036
\027\015\060\060\060\065\061\062\061\070\064\066\060\060\132\027
\015\062\065\060\065\061\062\062\063\065\071\060\060\132\060\132
\061\013\060\011\006\003\125\004\006\023\002\111\105\061\022\060
```

\020\006\003\125\004\012\023\011\102\141\154\164\151\155\157\162
\145\061\023\060\021\006\003\125\004\013\023\012\103\171\142\145
\162\124\162\165\163\164\061\042\060\040\006\003\125\004\003\023
\031\102\141\154\164\151\155\157\162\145\040\103\171\142\145\162
\124\162\165\163\164\040\122\157\157\164\060\202\001\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001
\017\000\060\202\001\012\002\202\001\001\000\243\004\273\042\253
\230\075\127\350\046\162\232\265\171\324\051\342\341\350\225\200
\261\260\343\133\216\053\051\232\144\337\241\135\355\260\011\005
\155\333\050\056\316\142\242\142\376\264\210\332\022\353\070\353
\041\235\300\101\053\001\122\173\210\167\323\034\217\307\272\271
\210\265\152\011\347\163\350\021\100\247\321\314\312\142\215\055
\345\217\013\246\120\322\250\120\303\050\352\365\253\045\207\212
\232\226\034\251\147\270\077\014\325\367\371\122\023\057\302\033
\325\160\160\360\217\300\022\312\006\313\232\341\331\312\063\172
\167\326\370\354\271\361\150\104\102\110\023\322\300\302\244\256
\136\140\376\266\246\005\374\264\335\007\131\002\324\131\030\230
\143\365\245\143\340\220\014\175\135\262\006\172\363\205\352\353
\324\003\256\136\204\076\137\377\025\355\151\274\371\071\066\162
\165\317\167\122\115\363\311\220\054\271\075\345\311\043\123\077
\037\044\230\041\134\007\231\051\275\306\072\354\347\156\206\072
\153\227\164\143\063\275\150\030\061\360\170\215\166\277\374\236
\216\135\052\206\247\115\220\334\047\032\071\002\003\001\000\001
\243\105\060\103\060\035\006\003\125\035\016\004\026\004\024\345
\235\131\060\202\107\130\314\254\372\010\124\066\206\173\072\265
\004\115\360\060\022\006\003\125\035\023\001\001\377\004\010\060
\006\001\001\377\002\001\003\060\016\006\003\125\035\017\001\001
\377\004\004\003\002\001\006\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\003\202\001\001\000\205\014\135\216\344
\157\121\150\102\005\240\335\273\117\047\045\204\003\275\367\144
\375\055\327\060\343\244\020\027\353\332\051\051\266\171\077\166
\366\031\023\043\270\020\012\371\130\244\324\141\160\275\004\141
\152\022\212\027\325\012\275\305\274\060\174\326\351\014\045\215
\206\100\117\354\314\243\176\070\306\067\021\117\355\335\150\061
\216\114\322\263\001\164\356\276\165\136\007\110\032\177\160\377
\026\134\204\300\171\205\270\005\375\177\276\145\021\243\017\300
\002\264\370\122\067\071\004\325\251\061\172\030\277\240\052\364
\022\231\367\243\105\202\343\074\136\365\235\236\265\310\236\174
\056\310\244\236\116\010\024\113\155\375\160\155\153\032\143\275
\144\346\037\267\316\360\362\237\056\273\033\267\362\120\210\163
\222\302\342\343\026\215\232\062\002\253\216\030\335\351\020\021
\356\176\065\253\220\257\076\060\224\172\320\063\075\247\145\017
\365\374\216\236\142\317\107\104\054\001\135\273\035\265\062\322
\107\322\070\056\320\376\201\334\062\152\036\265\356\074\325\374
\347\201\035\031\303\044\102\352\143\071\251

END

#

```

Trust for Certificate "Baltimore CyberTrust Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Baltimore CyberTrust Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\324\336\040\320\136\146\374\123\376\032\120\210\054\170\333\050
\122\312\344\164
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\254\266\224\245\234\027\340\327\221\122\233\261\227\006\246\344
END
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\111\105\061
\022\060\020\006\003\125\004\012\023\011\102\141\154\164\151\155
\157\162\145\061\023\060\021\006\003\125\004\013\023\012\103\171
\142\145\162\124\162\165\163\164\061\042\060\040\006\003\125\004
\003\023\031\102\141\154\164\151\155\157\162\145\040\103\171\142
\145\162\124\162\165\163\164\040\122\157\157\164
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\002\000\000\271
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Equifax Secure Global eBusiness CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Equifax Secure Global eBusiness CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\055\060
\053\006\003\125\004\003\023\044\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\107\154\157\142\141\154\040\145\102
\165\163\151\156\145\163\163\040\103\101\055\061
END
CKA_ID

```

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\055\060
\053\006\003\125\004\003\023\044\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\107\154\157\142\141\154\040\145\102
\165\163\151\156\145\163\163\040\103\101\055\061

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\220\060\202\001\371\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061\034
\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141\170
\040\123\145\143\165\162\145\040\111\156\143\056\061\055\060\053
\006\003\125\004\003\023\044\105\161\165\151\146\141\170\040\123
\145\143\165\162\145\040\107\154\157\142\141\154\040\145\102\165
\163\151\156\145\163\163\040\103\101\055\061\060\036\027\015\071
\071\060\066\062\061\060\064\060\060\060\060\132\027\015\062\060
\060\066\062\061\060\064\060\060\060\060\132\060\132\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\034\060\032\006\003
\125\004\012\023\023\105\161\165\151\146\141\170\040\123\145\143
\165\162\145\040\111\156\143\056\061\055\060\053\006\003\125\004
\003\023\044\105\161\165\151\146\141\170\040\123\145\143\165\162
\145\040\107\154\157\142\141\154\040\145\102\165\163\151\156\145
\163\163\040\103\101\055\061\060\201\237\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\201\215\000\060\201\211
\002\201\201\000\272\347\027\220\002\145\261\064\125\074\111\302
\121\325\337\247\321\067\217\321\347\201\163\101\122\140\233\235
\241\027\046\170\255\307\261\350\046\224\062\265\336\063\215\072
\057\333\362\232\172\132\163\230\243\134\351\373\212\163\033\134
\347\303\277\200\154\315\251\364\326\053\300\367\371\231\252\143
\242\261\107\002\017\324\344\121\072\022\074\154\212\132\124\204
\160\333\301\305\220\317\162\105\313\250\131\300\315\063\235\077
\243\226\353\205\063\041\034\076\036\076\140\156\166\234\147\205
\305\310\303\141\002\003\001\000\001\243\146\060\144\060\021\006
\011\140\206\110\001\206\370\102\001\001\004\004\003\002\000\007
\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001
\377\060\037\006\003\125\035\043\004\030\060\026\200\024\276\250
\240\164\162\120\153\104\267\311\043\330\373\250\377\263\127\153
\150\154\060\035\006\003\125\035\016\004\026\004\024\276\250\240
\164\162\120\153\104\267\311\043\330\373\250\377\263\127\153\150
\154\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000
\003\201\201\000\060\342\001\121\252\307\352\137\332\271\320\145
\017\060\326\076\332\015\024\111\156\221\223\047\024\061\357\304

```
\367\055\105\370\354\307\277\242\101\015\043\264\222\371\031\000
\147\275\001\257\315\340\161\374\132\317\144\304\340\226\230\320
\243\100\342\001\212\357\047\007\361\145\001\212\104\055\006\145
\165\122\300\206\020\040\041\137\154\153\017\154\256\011\034\257
\362\242\030\064\304\165\244\163\034\361\215\334\357\255\371\263
\166\264\222\277\334\225\020\036\276\313\310\073\132\204\140\031
\126\224\251\125
END
```

#

```
Trust for Certificate "Equifax Secure Global eBusiness CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Equifax Secure Global eBusiness CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\176\170\112\020\034\202\145\314\055\341\361\155\107\264\100\312
\331\012\031\105
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\217\135\167\006\047\304\230\074\133\223\170\347\327\175\233\314
END
```

```
CKA_ISSUER
MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\055\060
\053\006\003\125\004\003\023\044\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\107\154\157\142\141\154\040\145\102
\165\163\151\156\145\163\163\040\103\101\055\061
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

#

```
# Certificate "Equifax Secure eBusiness CA 1"
```

#

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Equifax Secure eBusiness CA 1"
```

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\123\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\046\060
\044\006\003\125\004\003\023\035\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\145\102\165\163\151\156\145\163\163
\040\103\101\055\061

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\123\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\046\060
\044\006\003\125\004\003\023\035\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\145\102\165\163\151\156\145\163\163
\040\103\101\055\061

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\004

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\202\060\202\001\353\240\003\002\001\002\002\001\004
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\123\061\013\060\011\006\003\125\004\006\023\002\125\123\061\034
\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141\170
\040\123\145\143\165\162\145\040\111\156\143\056\061\046\060\044
\006\003\125\004\003\023\035\105\161\165\151\146\141\170\040\123
\145\143\165\162\145\040\145\102\165\163\151\156\145\163\163\040
\103\101\055\061\060\036\027\015\071\071\060\066\062\061\060\064
\060\060\060\060\132\027\015\062\060\060\066\062\061\060\064\060
\060\060\060\132\060\123\061\013\060\011\006\003\125\004\006\023
\002\125\123\061\034\060\032\006\003\125\004\012\023\023\105\161
\165\151\146\141\170\040\123\145\143\165\162\145\040\111\156\143
\056\061\046\060\044\006\003\125\004\003\023\035\105\161\165\151
\146\141\170\040\123\145\143\165\162\145\040\145\102\165\163\151
\156\145\163\163\040\103\101\055\061\060\201\237\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\201\215\000\060
\201\211\002\201\201\000\316\057\031\274\027\267\167\336\223\251
\137\132\015\027\117\064\032\014\230\364\042\331\131\324\304\150
\106\360\264\065\305\205\003\040\306\257\105\245\041\121\105\101
\353\026\130\066\062\157\342\120\142\144\371\375\121\234\252\044
\331\364\235\203\052\207\012\041\323\022\070\064\154\215\000\156
\132\240\331\102\356\032\041\225\371\122\114\125\132\305\017\070
\117\106\372\155\370\056\065\326\035\174\353\342\360\260\165\200
\310\251\023\254\276\210\357\072\156\253\137\052\070\142\002\260
\022\173\376\217\246\003\002\003\001\000\001\243\146\060\144\060

```
\021\006\011\140\206\110\001\206\370\102\001\001\004\004\003\002
\000\007\060\017\006\003\125\035\023\001\001\377\004\005\060\003
\001\001\377\060\037\006\003\125\035\043\004\030\060\026\200\024
\112\170\062\122\021\333\131\026\066\136\337\301\024\066\100\152
\107\174\114\241\060\035\006\003\125\035\016\004\026\004\024\112
\170\062\122\021\333\131\026\066\136\337\301\024\066\100\152\107
\174\114\241\060\015\006\011\052\206\110\206\367\015\001\001\004
\005\000\003\201\201\000\165\133\250\233\003\021\346\351\126\114
\315\371\251\114\300\015\232\363\314\145\151\346\045\166\314\131
\267\326\124\303\035\315\231\254\031\335\264\205\325\340\075\374
\142\040\247\204\113\130\145\361\342\371\225\041\077\365\324\176
\130\036\107\207\124\076\130\241\265\265\370\052\357\161\347\274
\303\366\261\111\106\342\327\240\153\345\126\172\232\047\230\174
\106\142\024\347\311\374\156\003\022\171\200\070\035\110\202\215
\374\027\376\052\226\053\265\142\246\246\075\275\177\222\131\315
\132\052\202\262\067\171
```

END

#

Trust for Certificate "Equifax Secure eBusiness CA 1"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Equifax Secure eBusiness CA 1"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\332\100\030\213\221\211\243\355\356\256\332\227\376\057\235\365
\267\321\212\101
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\144\234\357\056\104\374\306\217\122\007\320\121\163\217\313\075
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\123\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\046\060
\044\006\003\125\004\003\023\035\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\145\102\165\163\151\156\145\163\163
\040\103\101\055\061
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\004
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE


```
#
# Certificate "Equifax Secure eBusiness CA 2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Equifax Secure eBusiness CA 2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\061\046\060\044\006\003\125\004
\013\023\035\105\161\165\151\146\141\170\040\123\145\143\165\162
\145\040\145\102\165\163\151\156\145\163\163\040\103\101\055\062
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\061\046\060\044\006\003\125\004
\013\023\035\105\161\165\151\146\141\170\040\123\145\143\165\162
\145\040\145\102\165\163\151\156\145\163\163\040\103\101\055\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\067\160\317\265
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\040\060\202\002\211\240\003\002\001\002\002\004\067
\160\317\265\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\116\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\027\060\025\006\003\125\004\012\023\016\105\161\165\151
\146\141\170\040\123\145\143\165\162\145\061\046\060\044\006\003
\125\004\013\023\035\105\161\165\151\146\141\170\040\123\145\143
\165\162\145\040\145\102\165\163\151\156\145\163\163\040\103\101
\055\062\060\036\027\015\071\071\060\066\062\063\061\062\061\064
\064\065\132\027\015\061\071\060\066\062\063\061\062\061\064\064
\065\132\060\116\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\027\060\025\006\003\125\004\012\023\016\105\161\165\151
\146\141\170\040\123\145\143\165\162\145\061\046\060\044\006\003
\125\004\013\023\035\105\161\165\151\146\141\170\040\123\145\143
\165\162\145\040\145\102\165\163\151\156\145\163\163\040\103\101
\055\062\060\201\237\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\201\215\000\060\201\211\002\201\201\000\344
\071\071\223\036\122\006\033\050\066\370\262\243\051\305\355\216
\262\021\275\376\353\347\264\164\302\217\377\005\347\331\235\006
```

\277\022\310\077\016\362\326\321\044\262\021\336\321\163\011\212
\324\261\054\230\011\015\036\120\106\262\203\246\105\215\142\150
\273\205\033\040\160\062\252\100\315\246\226\137\304\161\067\077
\004\363\267\101\044\071\007\032\036\056\141\130\240\022\013\345
\245\337\305\253\352\067\161\314\034\310\067\072\271\227\122\247
\254\305\152\044\224\116\234\173\317\300\152\326\337\041\275\002
\003\001\000\001\243\202\001\011\060\202\001\005\060\160\006\003
\125\035\037\004\151\060\147\060\145\240\143\240\141\244\137\060
\135\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027
\060\025\006\003\125\004\012\023\016\105\161\165\151\146\141\170
\040\123\145\143\165\162\145\061\046\060\044\006\003\125\004\013
\023\035\105\161\165\151\146\141\170\040\123\145\143\165\162\145
\040\145\102\165\163\151\156\145\163\163\040\103\101\055\062\061
\015\060\013\006\003\125\004\003\023\004\103\122\114\061\060\032
\006\003\125\035\020\004\023\060\021\201\017\062\060\061\071\060
\066\062\063\061\062\061\064\064\065\132\060\013\006\003\125\035
\017\004\004\003\002\001\006\060\037\006\003\125\035\043\004\030
\060\026\200\024\120\236\013\352\257\136\271\040\110\246\120\152
\313\375\330\040\172\247\202\166\060\035\006\003\125\035\016\004
\026\004\024\120\236\013\352\257\136\271\040\110\246\120\152\313
\375\330\040\172\247\202\166\060\014\006\003\125\035\023\004\005
\060\003\001\001\377\060\032\006\011\052\206\110\206\366\175\007
\101\000\004\015\060\013\033\005\126\063\056\060\143\003\002\006
\300\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\201\201\000\014\206\202\255\350\116\032\365\216\211\047\342
\065\130\075\051\264\007\217\066\120\225\277\156\301\236\353\304
\220\262\205\250\273\267\102\340\017\007\071\337\373\236\220\262
\321\301\076\123\237\003\104\260\176\113\364\157\344\174\037\347
\342\261\344\270\232\357\303\275\316\336\013\062\064\331\336\050
\355\063\153\304\324\327\075\022\130\253\175\011\055\313\160\365
\023\212\224\241\047\244\326\160\305\155\224\265\311\175\235\240
\322\306\010\111\331\146\233\246\323\364\013\334\305\046\127\341
\221\060\352\315

END

#

Trust for Certificate "Equifax Secure eBusiness CA

2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Equifax Secure eBusiness CA 2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\071\117\366\205\013\006\276\122\345\030\126\314\020\341\200\350

\202\263\205\314

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```

\252\277\277\144\227\332\230\035\157\306\010\072\225\160\063\312
END
CKA_ISSUER MULTILINE_OCTAL
\060\116\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\027\060\025\006\003\125\004\012\023\016\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\061\046\060\044\006\003\125\004
\013\023\035\105\161\165\151\146\141\170\040\123\145\143\165\162
\145\040\145\102\165\163\151\156\145\163\163\040\103\101\055\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\067\160\317\265
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE

#
# Certificate "beTRUSTed Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "beTRUSTed Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\127\127\061
\022\060\020\006\003\125\004\012\023\011\142\145\124\122\125\123
\124\145\144\061\033\060\031\006\003\125\004\003\023\022\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\163
\061\032\060\030\006\003\125\004\003\023\021\142\145\124\122\125
\123\124\145\144\040\122\157\157\164\040\103\101
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\127\127\061
\022\060\020\006\003\125\004\012\023\011\142\145\124\122\125\123
\124\145\144\061\033\060\031\006\003\125\004\003\023\022\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\163
\061\032\060\030\006\003\125\004\003\023\021\142\145\124\122\125
\123\124\145\144\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\071\117\175\207
END

```

CKA_VALUE MULTILINE_OCTAL

\060\202\005\054\060\202\004\024\240\003\002\001\002\002\004\071
\117\175\207\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\132\061\013\060\011\006\003\125\004\006\023\002\127
\127\061\022\060\020\006\003\125\004\012\023\011\142\145\124\122
\125\123\124\145\144\061\033\060\031\006\003\125\004\003\023\022
\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040\103
\101\163\061\032\060\030\006\003\125\004\003\023\021\142\145\124
\122\125\123\124\145\144\040\122\157\157\164\040\103\101\060\036
\027\015\060\060\060\066\062\060\061\064\062\061\060\064\132\027
\015\061\060\060\066\062\060\061\063\062\061\060\064\132\060\132
\061\013\060\011\006\003\125\004\006\023\002\127\127\061\022\060
\020\006\003\125\004\012\023\011\142\145\124\122\125\123\124\145
\144\061\033\060\031\006\003\125\004\003\023\022\142\145\124\122
\125\123\124\145\144\040\122\157\157\164\040\103\101\163\061\032
\060\030\006\003\125\004\003\023\021\142\145\124\122\125\123\124
\145\144\040\122\157\157\164\040\103\101\060\202\001\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001
\017\000\060\202\001\012\002\202\001\001\000\324\264\163\172\023
\012\070\125\001\276\211\126\341\224\236\324\276\132\353\112\064
\165\033\141\051\304\341\255\010\140\041\170\110\377\264\320\372
\136\101\215\141\104\207\350\355\311\130\372\374\223\232\337\117
\352\076\065\175\370\063\172\346\361\327\315\157\111\113\075\117
\055\156\016\203\072\030\170\167\243\317\347\364\115\163\330\232
\073\032\035\276\225\123\317\040\227\302\317\076\044\122\154\014
\216\145\131\305\161\377\142\011\217\252\305\217\314\140\240\163
\112\327\070\077\025\162\277\242\227\267\160\350\257\342\176\026
\006\114\365\252\144\046\162\007\045\255\065\374\030\261\046\327
\330\377\031\016\203\033\214\334\170\105\147\064\075\364\257\034
\215\344\155\153\355\040\263\147\232\264\141\313\027\157\211\065
\377\347\116\300\062\022\347\356\354\337\377\227\060\164\355\215
\107\216\353\264\303\104\346\247\114\177\126\103\350\270\274\266
\276\372\203\227\346\273\373\304\266\223\276\031\030\076\214\201
\271\163\210\026\364\226\103\234\147\163\027\220\330\011\156\143
\254\112\266\043\304\001\241\255\244\344\305\002\003\001\000\001
\243\202\001\370\060\202\001\364\060\017\006\003\125\035\023\001
\001\377\004\005\060\003\001\001\377\060\202\001\131\006\003\125
\035\040\004\202\001\120\060\202\001\114\060\202\001\110\006\012
\053\006\001\004\001\261\076\001\000\000\060\202\001\070\060\202
\001\001\006\010\053\006\001\005\005\007\002\002\060\201\364\032
\201\361\122\145\154\151\141\156\143\145\040\157\156\040\164\150
\151\163\040\143\145\162\164\151\146\151\143\141\164\145\040\142
\171\040\141\156\171\040\160\141\162\164\171\040\141\163\163\165
\155\145\163\040\141\143\143\145\160\164\141\156\143\145\040\157
\146\040\164\150\145\040\164\150\145\156\040\141\160\160\154\151
\143\141\142\154\145\040\163\164\141\156\144\141\162\144\040\164
\145\162\155\163\040\141\156\144\040\143\157\156\144\151\164\151
\157\156\163\040\157\146\040\165\163\145\054\040\141\156\144\040

\143\145\162\164\151\146\151\143\141\164\151\157\156\040\160\162
\141\143\164\151\143\145\040\163\164\141\164\145\155\145\156\164
\054\040\167\150\151\143\150\040\143\141\156\040\142\145\040\146
\157\165\156\144\040\141\164\040\142\145\124\122\125\123\124\145
\144\047\163\040\167\145\142\040\163\151\164\145\054\040\150\164
\164\160\163\072\057\057\167\167\167\056\142\145\124\122\125\123
\124\145\144\056\143\157\155\057\166\141\165\154\164\057\164\145
\162\155\163\060\061\006\010\053\006\001\005\005\007\002\001\026
\045\150\164\164\160\163\072\057\057\167\167\167\056\142\145\124
\122\125\123\124\145\144\056\143\157\155\057\166\141\165\154\164
\057\164\145\162\155\163\060\064\006\003\125\035\037\004\055\060
\053\060\051\240\047\240\045\244\043\060\041\061\022\060\020\006
\003\125\004\012\023\011\142\145\124\122\125\123\124\145\144\061
\013\060\011\006\003\125\004\006\023\002\127\127\060\035\006\003
\125\035\016\004\026\004\024\052\271\233\151\056\073\233\330\315
\336\052\061\004\064\153\312\007\030\253\147\060\037\006\003\125
\035\043\004\030\060\026\200\024\052\271\233\151\056\073\233\330
\315\336\052\061\004\064\153\312\007\030\253\147\060\016\006\003
\125\035\017\001\001\377\004\004\003\002\001\376\060\015\006\011
\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000
\171\141\333\243\136\156\026\261\352\166\121\371\313\025\233\313
\151\276\346\201\153\237\050\037\145\076\335\021\205\222\324\350
\101\277\176\063\275\043\347\361\040\277\244\264\246\031\001\306
\214\215\065\174\145\244\117\011\244\326\330\043\025\005\023\247
\103\171\257\333\243\016\233\173\170\032\363\004\206\132\306\366
\214\040\107\070\111\120\006\235\162\147\072\360\230\003\255\226
\147\104\374\077\020\015\206\115\344\000\073\051\173\316\073\073
\231\206\141\045\100\204\334\023\142\267\372\312\131\326\003\036
\326\123\001\315\155\114\150\125\100\341\356\153\307\052\000\000
\110\202\263\012\001\303\140\052\014\367\202\065\356\110\206\226
\344\164\324\075\352\001\161\272\004\165\100\247\251\177\071\071
\232\125\227\051\145\256\031\125\045\005\162\107\323\350\030\334
\270\351\257\103\163\001\022\164\243\341\134\137\025\135\044\363
\371\344\364\266\147\147\022\347\144\042\212\366\245\101\246\034
\266\140\143\105\212\020\264\272\106\020\256\101\127\145\154\077
\043\020\077\041\020\131\267\344\100\335\046\014\043\366\252\256
END

#

Trust for Certificate "beTRUSTed Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "beTRUSTed Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\133\315\315\314\146\366\334\344\104\037\343\175\134\303\023\114
\106\364\160\070

```

END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\205\312\166\132\033\321\150\042\334\242\043\022\312\306\200\064
END
CKA_ISSUER
MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\127\127\061
\022\060\020\006\003\125\004\012\023\011\142\145\124\122\125\123
\124\145\144\061\033\060\031\006\003\125\004\003\023\022\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\163
\061\032\060\030\006\003\125\004\003\023\021\142\145\124\122\125
\123\124\145\144\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\071\117\175\207
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "AddTrust Low-Value Services Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AddTrust Low-Value Services
Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\003\023\030\101
\144\144\124\162\165\163\164\040\103\154\141\163\163\040\061\040
\103\101\040\122\157\157\164
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\145\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\003\023\030\101
\144\144\124\162\165\163\164\040\103\154\141\163\163\040\061\040

```

\103\101\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE
MULTILINE_OCTAL
\060\202\004\030\060\202\003\000\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\145\061\013\060\011\006\003\125\004\006\023\002\123\105\061\024
\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165\163
\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024\101
\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164\167
\157\162\153\061\041\060\037\006\003\125\004\003\023\030\101\144
\144\124\162\165\163\164\040\103\154\141\163\163\040\061\040\103
\101\040\122\157\157\164\060\036\027\015\060\060\060\065\063\060
\061\060\063\070\063\061\132\027\015\062\060\060\065\063\060\061
\060\063\070\063\061\132\060\145\061\013\060\011\006\003\125\004
\006\023\002\123\105\061\024\060\022\006\003\125\004\012\023\013
\101\144\144\124\162\165\163\164\040\101\102\061\035\060\033\006
\003\125\004\013\023\024\101\144\144\124\162\165\163\164\040\124
\124\120\040\116\145\164\167\157\162\153\061\041\060\037\006\003
\125\004\003\023\030\101\144\144\124\162\165\163\164\040\103\154
\141\163\163\040\061\040\103\101\040\122\157\157\164\060\202\001
\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\202\001\017\000\060\202\001\012\002\202\001\001\000\226\226
\324\041\111\140\342\153\350\101\007\014\336\304\340\334\023\043
\315\301\065\307\373\326\116\021\012\147\136\365\006\133\153\245
\010\073\133\051\026\072\347\207\262\064\006\305\274\005\245\003
\174\202\313\051\020\256\341\210\201\275\326\236\323\376\055\126
\301\025\316\343\046\235\025\056\020\373\006\217\060\004\336\247
\264\143\264\377\261\234\256\074\257\167\266\126\305\265\253\242
\351\151\072\075\016\063\171\062\077\160\202\222\231\141\155\215
\060\010\217\161\077\246\110\127\031\370\045\334\113\146\134\245
\164\217\230\256\310\371\300\006\042\347\254\163\337\245\056\373
\122\334\261\025\145\040\372\065\146\151\336\337\054\361\156\274
\060\333\054\044\022\333\353\065\065\150\220\313\000\260\227\041
\075\164\041\043\145\064\053\273\170\131\243\326\341\166\071\232
\244\111\216\214\164\257\156\244\232\243\331\233\322\070\134\233
\242\030\314\165\043\204\276\353\342\115\063\161\216\032\360\302
\370\307\035\242\255\003\227\054\370\317\045\306\366\270\044\061
\261\143\135\222\177\143\360\045\311\123\056\037\277\115\002\003
\001\000\001\243\201\322\060\201\317\060\035\006\003\125\035\016
\004\026\004\024\225\261\264\360\224\266\275\307\332\321\021\011
\041\276\301\257\111\375\020\173\060\013\006\003\125\035\017\004
\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377\004
\005\060\003\001\001\377\060\201\217\006\003\125\035\043\004\201
\207\060\201\204\200\024\225\261\264\360\224\266\275\307\332\321

```
\021\011\041\276\301\257\111\375\020\173\241\151\244\147\060\145
\061\013\060\011\006\003\125\004\006\023\002\123\105\061\024\060
\022\006\003\125\004\012\023\013\101\144\144\124\162\165\163\164
\040\101\102\061\035\060\033\006\003\125\004\013\023\024\101\144
\144\124\162\165\163\164\040\124\124\120\040\116\145\164\167\157
\162\153\061\041\060\037\006\003\125\004\003\023\030\101\144\144
\124\162\165\163\164\040\103\154\141\163\163\040\061\040\103\101
\040\122\157\157\164\202\001\001\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\202\001\001\000\054\155\144\033
\037\315\015\335\271\001\372\226\143\064\062\110\107\231\256\227
\355\375\162\026\246\163\107\132\364\353\335\351\365\326\373\105
\314\051\211\104\135\277\106\071\075\350\356\274\115\124\206\036
\035\154\343\027\047\103\341\211\126\053\251\157\162\116\111\063
\343\162\174\052\043\232\274\076\377\050\052\355\243\377\034\043
\272\103\127\011\147\115\113\142\006\055\370\377\154\235\140\036
\330\034\113\175\265\061\057\331\320\174\135\370\336\153\203\030
\170\067\127\057\350\063\007\147\337\036\307\153\052\225\166\256
\217\127\243\360\364\122\264\251\123\010\317\340\117\323\172\123
\213\375\273\034\126\066\362\376\262\266\345\166\273\325\042\145
\247\077\376\321\146\255\013\274\153\231\206\357\077\175\363\030
\062\312\173\306\343\253\144\106\225\370\046\151\331\125\203\173
\054\226\007\377\131\054\104\243\306\345\351\251\334\241\143\200
\132\041\136\041\317\123\124\360\272\157\211\333\250\252\225\317
\213\343\161\314\036\033\040\104\010\300\172\266\100\375\304\344
\065\341\035\026\034\320\274\053\216\326\161\331
```

END

#

Trust for Certificate "AddTrust Low-Value Services Root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "AddTrust Low-Value Services Root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\314\253\016\240\114\043\001\326\151\173\335\067\237\315\022\353
\044\343\224\235
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\036\102\225\002\063\222\153\271\137\300\177\332\326\262\113\374
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\145\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\003\023\030\101
\144\144\124\162\165\163\164\040\103\154\141\163\163\040\061\040
```



```
\103\101\040\122\157\157\164
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "AddTrust External Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AddTrust External Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

```
\060\157\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\046\060\044\006\003\125\004\013\023\035
\101\144\144\124\162\165\163\164\040\105\170\164\145\162\156\141
\154\040\124\124\120\040\116\145\164\167\157\162\153\061\042\060
\040\006\003\125\004\003\023\031\101\144\144\124\162\165\163\164
\040\105\170\164\145\162\156\141\154\040\103\101\040\122\157\157
\164
```

```
END
CKA_ID
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\157\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\046\060\044\006\003\125\004\013\023\035
\101\144\144\124\162\165\163\164\040\105\170\164\145\162\156\141
\154\040\124\124\120\040\116\145\164\167\157\162\153\061\042\060
\040\006\003\125\004\003\023\031\101\144\144\124\162\165\163\164
\040\105\170\164\145\162\156\141\154\040\103\101\040\122\157\157
\164
```

```
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
```

```
CKA_VALUE MULTILINE_OCTAL
\060\202\004\066\060\202\003\036\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
```

\157\061\013\060\011\006\003\125\004\006\023\002\123\105\061\024
\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165\163
\164\040\101\102\061\046\060\044\006\003\125\004\013\023\035\101
\144\144\124\162\165\163\164\040\105\170\164\145\162\156\141\154
\040\124\124\120\040\116\145\164\167\157\162\153\061\042\060\040
\006\003\125\004\003\023\031\101\144\144\124\162\165\163\164\040
\105\170\164\145\162\156\141\154\040\103\101\040\122\157\157\164
\060\036\027\015\060\060\060\065\063\060\061\060\064\070\063\070
\132\027\015\062\060\060\065\063\060\061\060\064\070\063\070\132
\060\157\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\046\060\044\006\003\125\004\013\023\035
\101\144\144\124\162\165\163\164\040\105\170\164\145\162\156\141
\154\040\124\124\120\040\116\145\164\167\157\162\153\061\042\060
\040\006\003\125\004\003\023\031\101\144\144\124\162\165\163\164
\040\105\170\164\145\162\156\141\154\040\103\101\040\122\157\157
\164\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001
\001\000\267\367\032\063\346\362\000\004\055\071\340\116\133\355
\037\274\154\017\315\265\372\043\266\316\336\233\021\063\227\244
\051\114\175\223\237\275\112\274\223\355\003\032\343\217\317\345
\155\120\132\326\227\051\224\132\200\260\111\172\333\056\225\375
\270\312\277\067\070\055\036\076\221\101\255\160\126\307\360\117
\077\350\062\236\164\312\310\220\124\351\306\137\017\170\235\232
\100\074\016\254\141\252\136\024\217\236\207\241\152\120\334\327
\232\116\257\005\263\246\161\224\234\161\263\120\140\012\307\023
\235\070\007\206\002\250\351\250\151\046\030\220\253\114\260\117
\043\253\072\117\204\330\337\316\237\341\151\157\273\327\102\327
\153\104\344\307\255\356\155\101\137\162\132\161\010\067\263\171
\145\244\131\240\224\067\367\000\057\015\302\222\162\332\320\070
\162\333\024\250\105\304\135\052\175\267\264\326\304\356\254\315
\023\104\267\311\053\335\103\000\045\372\141\271\151\152\130\043
\021\267\247\063\217\126\165\131\365\315\051\327\106\267\012\053
\145\266\323\102\157\025\262\270\173\373\357\351\135\123\325\064
\132\047\002\003\001\000\001\243\201\334\060\201\331\060\035\006
\003\125\035\016\004\026\004\024\255\275\230\172\064\264\046\367
\372\304\046\124\357\003\275\340\044\313\124\032\060\013\006\003
\125\035\017\004\004\003\002\001\006\060\017\006\003\125\035\023
\001\001\377\004\005\060\003\001\001\377\060\201\231\006\003\125
\035\043\004\201\221\060\201\216\200\024\255\275\230\172\064\264
\046\367\372\304\046\124\357\003\275\340\044\313\124\032\241\163
\244\161\060\157\061\013\060\011\006\003\125\004\006\023\002\123
\105\061\024\060\022\006\003\125\004\012\023\013\101\144\144\124
\162\165\163\164\040\101\102\061\046\060\044\006\003\125\004\013
\023\035\101\144\144\124\162\165\163\164\040\105\170\164\145\162
\156\141\154\040\124\124\120\040\116\145\164\167\157\162\153\061
\042\060\040\006\003\125\004\003\023\031\101\144\144\124\162\165
\163\164\040\105\170\164\145\162\156\141\154\040\103\101\040\122

```
\157\157\164\202\001\001\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\001\001\000\260\233\340\205\045\302
\326\043\342\017\226\006\222\235\101\230\234\331\204\171\201\331
\036\133\024\007\043\066\145\217\260\330\167\273\254\101\154\107
\140\203\121\260\371\062\075\347\374\366\046\023\307\200\026\245
\277\132\374\207\317\170\171\211\041\232\342\114\007\012\206\065
\274\362\336\121\304\322\226\267\334\176\116\356\160\375\034\071
\353\014\002\121\024\055\216\275\026\340\301\337\106\165\347\044
\255\354\364\102\264\205\223\160\020\147\272\235\006\065\112\030
\323\053\172\314\121\102\241\172\143\321\346\273\241\305\053\302
\066\276\023\015\346\275\143\176\171\173\247\011\015\100\253\152
\335\217\212\303\366\366\214\032\102\005\121\324\105\365\237\247
\142\041\150\025\040\103\074\231\347\174\275\044\330\251\221\027
\163\210\077\126\033\061\070\030\264\161\017\232\315\310\016\236
\216\056\033\341\214\230\203\313\037\061\361\104\114\306\004\163
\111\166\140\017\307\370\275\027\200\153\056\351\314\114\016\132
\232\171\017\040\012\056\325\236\143\046\036\125\222\224\330\202
\027\132\173\320\274\307\217\116\206\004
END
```

#

```
Trust for Certificate "AddTrust External Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AddTrust External Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\002\372\363\342\221\103\124\150\140\170\127\151\115\365\344\133
\150\205\030\150
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\035\065\124\004\205\170\260\077\102\102\115\277\040\163\012\077
END
CKA_ISSUER MULTILINE_OCTAL
\060\157\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\046\060\044\006\003\125\004\013\023\035
\101\144\144\124\162\165\163\164\040\105\170\164\145\162\156\141
\154\040\124\124\120\040\116\145\164\167\157\162\153\061\042\060
\040\006\003\125\004\003\023\031\101\144\144\124\162\165\163\164
\040\105\170\164\145\162\156\141\154\040\103\101\040\122\157\157
\164
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "AddTrust Public Services Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AddTrust Public Services Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\144\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\040\060\036\006\003\125\004\003\023\027\101
\144\144\124\162\165\163\164\040\120\165\142\154\151\143\040\103
\101\040\122\157\157\164
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\144\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\040\060\036\006\003\125\004\003\023\027\101
\144\144\124\162\165\163\164\040\120\165\142\154\151\143\040\103
\101\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\004\025\060\202\002\375\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\144\061\013\060\011\006\003\125\004\006\023\002\123\105\061\024
\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165\163
\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024\101
\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164\167
\157\162\153\061\040\060\036\006\003\125\004\003\023\027\101\144
\144\124\162\165\163\164\040\120\165\142\154\151\143\040\103\101
\040\122\157\157\164\060\036\027\015\060\060\060\065\063\060\061
\060\064\061\065\060\132\027\015\062\060\060\065\063\060\061\060
```

\064\061\065\060\132\060\144\061\013\060\011\006\003\125\004\006
\023\002\123\105\061\024\060\022\006\003\125\004\012\023\013\101
\144\144\124\162\165\163\164\040\101\102\061\035\060\033\006\003
\125\004\013\023\024\101\144\144\124\162\165\163\164\040\124\124
\120\040\116\145\164\167\157\162\153\061\040\060\036\006\003\125
\004\003\023\027\101\144\144\124\162\165\163\164\040\120\165\142
\154\151\143\040\103\101\040\122\157\157\164\060\202\001\042\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202
\001\017\000\060\202\001\012\002\202\001\001\000\351\032\060\217
\203\210\024\301\040\330\074\233\217\033\176\003\164\273\332\151
\323\106\245\370\216\302\014\021\220\121\245\057\146\124\100\125
\352\333\037\112\126\356\237\043\156\364\071\313\241\271\157\362
\176\371\135\207\046\141\236\034\370\342\354\246\201\370\041\305
\044\314\021\014\077\333\046\162\172\307\001\227\007\027\371\327
\030\054\060\175\016\172\036\142\036\306\113\300\375\175\142\167
\323\104\036\047\366\077\113\104\263\267\070\331\071\037\140\325
\121\222\163\003\264\000\151\343\363\024\116\356\321\334\011\317
\167\064\106\120\260\370\021\362\376\070\171\367\007\071\376\121
\222\227\013\133\010\137\064\206\001\255\210\227\353\146\315\136
\321\377\334\175\362\204\332\272\167\255\334\200\010\307\247\207
\326\125\237\227\152\350\310\021\144\272\347\031\051\077\021\263
\170\220\204\040\122\133\021\357\170\320\203\366\325\110\220\320
\060\034\317\200\371\140\376\171\344\210\362\335\000\353\224\105
\353\145\224\151\100\272\300\325\264\270\272\175\004\021\250\353
\061\005\226\224\116\130\041\216\237\320\140\375\002\003\001\000
\001\243\201\321\060\201\316\060\035\006\003\125\035\016\004\026
\004\024\201\076\067\330\222\260\037\167\237\134\264\253\163\252
\347\366\064\140\057\372\060\013\006\003\125\035\017\004\004\003
\002\001\006\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\201\216\006\003\125\035\043\004\201\206\060
\201\203\200\024\201\076\067\330\222\260\037\167\237\134\264\253
\163\252\347\366\064\140\057\372\241\150\244\146\060\144\061\013
\060\011\006\003\125\004\006\023\002\123\105\061\024\060\022\006
\003\125\004\012\023\013\101\144\144\124\162\165\163\164\040\101
\102\061\035\060\033\006\003\125\004\013\023\024\101\144\144\124
\162\165\163\164\040\124\124\120\040\116\145\164\167\157\162\153
\061\040\060\036\006\003\125\004\003\023\027\101\144\144\124\162
\165\163\164\040\120\165\142\154\151\143\040\103\101\040\122\157
\157\164\202\001\001\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\003\202\001\001\000\003\367\025\112\370\044\332
\043\126\026\223\166\335\066\050\271\256\033\270\303\361\144\272
\040\030\170\225\051\047\127\005\274\174\052\364\271\121\125\332
\207\002\336\017\026\027\061\370\252\171\056\011\023\273\257\262
\040\031\022\345\223\371\113\371\203\350\104\325\262\101\045\277
\210\165\157\377\020\374\112\124\320\137\360\372\357\066\163\175
\033\066\105\306\041\155\264\025\270\116\317\234\134\245\075\132
\000\216\006\343\074\153\062\173\362\237\360\266\375\337\360\050
\030\110\360\306\274\320\277\064\200\226\302\112\261\155\216\307

```
\220\105\336\057\147\254\105\004\243\172\334\125\222\311\107\146
\330\032\214\307\355\234\116\232\340\022\273\265\152\114\204\341
\341\042\015\207\000\144\376\214\175\142\071\145\246\357\102\266
\200\045\022\141\001\250\044\023\160\000\021\046\137\372\065\120
\305\110\314\006\107\350\047\330\160\215\137\144\346\241\104\046
\136\042\354\222\315\377\102\232\104\041\155\134\305\343\042\035
\137\107\022\347\316\137\135\372\330\252\261\063\055\331\166\362
\116\072\063\014\053\263\055\220\006
```

END

#

Trust for Certificate "AddTrust Public Services Root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "AddTrust Public Services Root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\052\266\050\110\136\170\373\363\255\236\171\020\335\153\337\231
\162\054\226\345
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\301\142\076\043\305\202\163\234\003\131\113\053\351\167\111\177
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\144\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\040\060\036\006\003\125\004\003\023\027\101
\144\144\124\162\165\163\164\040\120\165\142\154\151\143\040\103
\101\040\122\157\157\164
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\001\001
```

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "AddTrust Qualified Certificates Root"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AddTrust Qualified Certificates Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\147\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\043\060\041\006\003\125\004\003\023\032\101
\144\144\124\162\165\163\164\040\121\165\141\154\151\146\151\145
\144\040\103\101\040\122\157\157\164
END
CKA_ID UTF8 "0"
CKA_ISSUER
MULTILINE_OCTAL
\060\147\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\043\060\041\006\003\125\004\003\023\032\101
\144\144\124\162\165\163\164\040\121\165\141\154\151\146\151\145
\144\040\103\101\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\004\036\060\202\003\006\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\147\061\013\060\011\006\003\125\004\006\023\002\123\105\061\024
\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165\163
\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024\101
\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164\167
\157\162\153\061\043\060\041\006\003\125\004\003\023\032\101\144
\144\124\162\165\163\164\040\121\165\141\154\151\146\151\145\144
\040\103\101\040\122\157\157\164\060\036\027\015\060\060\060\065
\063\060\061\060\064\064\065\060\132\027\015\062\060\060\065\063
\060\061\060\064\064\065\060\132\060\147\061\013\060\011\006\003
\125\004\006\023\002\123\105\061\024\060\022\006\003\125\004\012
\023\013\101\144\144\124\162\165\163\164\040\101\102\061\035\060
\033\006\003\125\004\013\023\024\101\144\144\124\162\165\163\164
\040\124\124\120\040\116\145\164\167\157\162\153\061\043\060\041
\006\003\125\004\003\023\032\101\144\144\124\162\165\163\164\040
\121\165\141\154\151\146\151\145\144\040\103\101\040\122\157\157
\164\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001
\001\000\344\036\232\376\334\011\132\207\244\237\107\276\021\137
\257\204\064\333\142\074\171\170\267\351\060\265\354\014\034\052
```

\304\026\377\340\354\161\353\212\365\021\156\355\117\015\221\322
\022\030\055\111\025\001\302\244\042\023\307\021\144\377\042\022
\232\271\216\134\057\010\317\161\152\263\147\001\131\361\135\106
\363\260\170\245\366\016\102\172\343\177\033\314\320\360\267\050
\375\052\352\236\263\260\271\004\252\375\366\307\264\261\270\052
\240\373\130\361\031\240\157\160\045\176\076\151\112\177\017\042
\330\357\255\010\021\232\051\231\341\252\104\105\232\022\136\076
\235\155\122\374\347\240\075\150\057\360\113\160\174\023\070\255
\274\025\045\361\326\316\253\242\300\061\326\057\237\340\377\024
\131\374\204\223\331\207\174\114\124\023\353\237\321\055\021\370
\030\072\072\336\045\331\367\323\100\355\244\006\022\304\073\341
\221\301\126\065\360\024\334\145\066\011\156\253\244\007\307\065
\321\302\003\063\066\133\165\046\155\102\361\022\153\103\157\113
\161\224\372\064\035\355\023\156\312\200\177\230\057\154\271\145
\330\351\002\003\001\000\001\243\201\324\060\201\321\060\035\006
\003\125\035\016\004\026\004\024\071\225\213\142\213\134\311\324
\200\272\130\017\227\077\025\010\103\314\230\247\060\013\006\003
\125\035\017\004\004\003\002\001\006\060\017\006\003\125\035\023
\001\001\377\004\005\060\003\001\001\377\060\201\221\006\003\125
\035\043\004\201\211\060\201\206\200\024\071\225\213\142\213\134
\311\324\200\272\130\017\227\077\025\010\103\314\230\247\241\153
\244\151\060\147\061\013\060\011\006\003\125\004\006\023\002\123
\105\061\024\060\022\006\003\125\004\012\023\013\101\144\144\124
\162\165\163\164\040\101\102\061\035\060\033\006\003\125\004\013
\023\024\101\144\144\124\162\165\163\164\040\124\124\120\040\116
\145\164\167\157\162\153\061\043\060\041\006\003\125\004\003\023
\032\101\144\144\124\162\165\163\164\040\121\165\141\154\151\146
\151\145\144\040\103\101\040\122\157\157\164\202\001\001\060\015
\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001
\001\000\031\253\165\352\370\213\145\141\225\023\272\151\004\357
\206\312\023\240\307\252\117\144\033\077\030\366\250\055\054\125
\217\005\267\060\352\102\152\035\300\045\121\055\247\277\014\263
\355\357\010\177\154\074\106\032\352\030\103\337\166\314\371\146
\206\234\054\150\365\351\027\370\061\263\030\304\326\110\175\043
\114\150\301\176\273\001\024\157\305\331\156\336\273\004\102\152
\370\366\134\175\345\332\372\207\353\015\065\122\147\320\236\227
\166\005\223\077\225\307\001\346\151\125\070\177\020\141\231\311
\343\137\246\312\076\202\143\110\252\342\010\110\076\252\362\262
\205\142\246\264\247\331\275\067\234\150\265\055\126\175\260\267
\077\240\261\007\326\351\117\334\336\105\161\060\062\177\033\056
\011\371\277\122\241\356\302\200\076\006\134\056\125\100\301\033
\365\160\105\260\334\135\372\366\162\132\167\322\143\315\317\130
\211\000\102\143\077\171\071\320\104\260\202\156\101\031\350\335
\340\301\210\132\321\036\161\223\037\044\060\164\345\036\250\336
\074\047\067\177\203\256\236\167\317\360\060\261\377\113\231\350
\306\241

END


```

#
Trust for Certificate "AddTrust Qualified Certificates Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE
CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AddTrust Qualified Certificates Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\115\043\170\354\221\225\071\265\000\177\165\217\003\073\041\036
\305\115\213\317
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\047\354\071\107\315\332\132\257\342\232\001\145\041\251\114\273
END
CKA_ISSUER MULTILINE_OCTAL
\060\147\061\013\060\011\006\003\125\004\006\023\002\123\105\061
\024\060\022\006\003\125\004\012\023\013\101\144\144\124\162\165
\163\164\040\101\102\061\035\060\033\006\003\125\004\013\023\024
\101\144\144\124\162\165\163\164\040\124\124\120\040\116\145\164
\167\157\162\153\061\043\060\041\006\003\125\004\003\023\032\101
\144\144\124\162\165\163\164\040\121\165\141\154\151\146\151\145
\144\040\103\101\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE

```

```

#
# Certificate "Thawte Time Stamping CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Thawte Time Stamping CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\213\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\024\060\022\006\003\125\004\007
\023\013\104\165\162\142\141\156\166\151\154\154\145\061\017\060
\015\006\003\125\004\012\023\006\124\150\141\167\164\145\061\035

```

\060\033\006\003\125\004\013\023\024\124\150\141\167\164\145\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\061\037\060
\035\006\003\125\004\003\023\026\124\150\141\167\164\145\040\124
\151\155\145\163\164\141\155\160\151\156\147\040\103\101

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\213\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\024\060\022\006\003\125\004\007
\023\013\104\165\162\142\141\156\166\151\154\154\145\061\017\060
\015\006\003\125\004\012\023\006\124\150\141\167\164\145\061\035
\060\033\006\003\125\004\013\023\024\124\150\141\167\164\145\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\061\037\060
\035\006\003\125\004\003\023\026\124\150\141\167\164\145\040\124
\151\155\145\163\164\141\155\160\151\156\147\040\103\101

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\241\060\202\002\012\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\201\213\061\013\060\011\006\003\125\004\006\023\002\132\101\061
\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145\162
\156\040\103\141\160\145\061\024\060\022\006\003\125\004\007\023
\013\104\165\162\142\141\156\166\151\154\154\145\061\017\060\015
\006\003\125\004\012\023\006\124\150\141\167\164\145\061\035\060
\033\006\003\125\004\013\023\024\124\150\141\167\164\145\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\061\037\060\035
\006\003\125\004\003\023\026\124\150\141\167\164\145\040\124\151
\155\145\163\164\141\155\160\151\156\147\040\103\101\060\036\027
\015\071\067\060\061\060\061\060\060\060\060\060\060\132\027\015
\062\060\061\062\063\061\062\063\065\071\065\071\132\060\201\213
\061\013\060\011\006\003\125\004\006\023\002\132\101\061\025\060
\023\006\003\125\004\010\023\014\127\145\163\164\145\162\156\040
\103\141\160\145\061\024\060\022\006\003\125\004\007\023\013\104
\165\162\142\141\156\166\151\154\154\145\061\017\060\015\006\003
\125\004\012\023\006\124\150\141\167\164\145\061\035\060\033\006
\003\125\004\013\023\024\124\150\141\167\164\145\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\061\037\060\035\006\003
\125\004\003\023\026\124\150\141\167\164\145\040\124\151\155\145
\163\164\141\155\160\151\156\147\040\103\101\060\201\237\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201\215
\000\060\201\211\002\201\201\000\326\053\130\170\141\105\206\123
\352\064\173\121\234\355\260\346\056\030\016\376\340\137\250\047
\323\264\311\340\174\131\116\026\016\163\124\140\301\177\366\237

```
\056\351\072\205\044\025\074\333\107\004\143\303\236\304\224\032
\132\337\114\172\363\331\103\035\074\020\172\171\045\333\220\376
\360\121\347\060\326\101\000\375\237\050\337\171\276\224\273\235
\266\024\343\043\205\327\251\101\340\114\244\171\260\053\032\213
\362\370\073\212\076\105\254\161\222\000\264\220\101\230\373\137
\355\372\267\056\212\370\210\067\002\003\001\000\001\243\023\060
\021\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001
\001\377\060\015\006\011\052\206\110\206\367\015\001\001\004\005
\000\003\201\201\000\147\333\342\302\346\207\075\100\203\206\067
\065\175\037\316\232\303\014\146\040\250\272\252\004\211\206\302
\365\020\010\015\277\313\242\005\212\320\115\066\076\364\327\357
\151\306\136\344\260\224\157\112\271\347\336\133\210\266\173\333
\343\047\345\166\303\360\065\301\313\265\047\233\063\171\334\220
\246\000\236\167\372\374\315\047\224\102\026\234\323\034\150\354
\277\134\335\345\251\173\020\012\062\164\124\023\061\213\205\003
\204\221\267\130\001\060\024\070\257\050\312\374\261\120\031\031
\011\254\211\111\323
```

END

#

Trust for Certificate "Thawte Time Stamping CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Thawte Time Stamping CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\276\066\244\126\057\262\356\005\333\263\323\043\043\255\364\105
\010\116\326\126
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\177\146\172\161\323\353\151\170\040\232\121\024\235\203\332\040
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\213\061\013\060\011\006\003\125\004\006\023\002\132\101
\061\025\060\023\006\003\125\004\010\023\014\127\145\163\164\145
\162\156\040\103\141\160\145\061\024\060\022\006\003\125\004\007
\023\013\104\165\162\142\141\156\166\151\154\154\145\061\017\060
\015\006\003\125\004\012\023\006\124\150\141\167\164\145\061\035
\060\033\006\003\125\004\013\023\024\124\150\141\167\164\145\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\061\037\060
\035\006\003\125\004\003\023\026\124\150\141\167\164\145\040\124
\151\155\145\163\164\141\155\160\151\156\147\040\103\101
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\000
```

END

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "Entrust.net Global Secure Server CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "Entrust.net Global Secure Server CA"
```

```
CKA_CERTIFICATE_TYPE
```

```
CK_CERTIFICATE_TYPE CKC_X_509
```

```
CKA_SUBJECT MULTILINE_OCTAL
```

```
\060\201\272\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\077\060\075\006\003\125
\004\013\024\066\167\167\167\056\145\156\164\162\165\163\164\056
\156\145\164\057\123\123\114\137\103\120\123\040\151\156\143\157
\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151\155
\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006\003
\125\004\013\023\034\050\143\051\040\062\060\060\060\040\105\156
\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164\145
\144\061\072\060\070\006\003\125\004\003\023\061\105\156\164\162
\165\163\164\056\156\145\164\040\123\145\143\165\162\145\040\123
\145\162\166\145\162\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\101\165\164\150\157\162\151\164\171
```

```
END
```

```
CKA_ID UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\201\272\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\077\060\075\006\003\125
\004\013\024\066\167\167\167\056\145\156\164\162\165\163\164\056
\156\145\164\057\123\123\114\137\103\120\123\040\151\156\143\157
\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151\155
\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006\003
\125\004\013\023\034\050\143\051\040\062\060\060\060\040\105\156
\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164\145
\144\061\072\060\070\006\003\125\004\003\023\061\105\156\164\162
\165\163\164\056\156\145\164\040\123\145\143\165\162\145\040\123
\145\162\166\145\162\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\101\165\164\150\157\162\151\164\171
```

```
END
```

```
CKA_SERIAL_NUMBER
```

```
MULTILINE_OCTAL
```

```
\002\004\070\233\021\074
```

```
END
```

CKA_VALUE MULTILINE_OCTAL

\060\202\004\225\060\202\003\376\240\003\002\001\002\002\004\070
\233\021\074\060\015\006\011\052\206\110\206\367\015\001\001\004
\005\000\060\201\272\061\024\060\022\006\003\125\004\012\023\013
\105\156\164\162\165\163\164\056\156\145\164\061\077\060\075\006
\003\125\004\013\024\066\167\167\167\056\145\156\164\162\165\163
\164\056\156\145\164\057\123\123\114\137\103\120\123\040\151\156
\143\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154
\151\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043
\006\003\125\004\013\023\034\050\143\051\040\062\060\060\060\040
\105\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151
\164\145\144\061\072\060\070\006\003\125\004\003\023\061\105\156
\164\162\165\163\164\056\156\145\164\040\123\145\143\165\162\145
\040\123\145\162\166\145\162\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060
\036\027\015\060\060\060\062\060\064\061\067\065\060\060\060\132
\027\015\062\060\060\062\060\064\061\067\065\060\060\060\132\060
\201\272\061\024\060\022\006\003\125\004\012\023\013\105\156\164
\162\165\163\164\056\156\145\164\061\077\060\075\006\003\125\004
\013\024\066\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\123\123\114\137\103\120\123\040\151\156\143\157\162
\160\056\040\142\171\040\162\145\146\056\040\050\154\151\155\151
\164\163\040\154\151\141\142\056\051\061\045\060\043\006\003\125
\004\013\023\034\050\143\051\040\062\060\060\060\040\105\156\164
\162\165\163\164\056\156\145\164\040\114\151\155\151\164\145\144
\061\072\060\070\006\003\125\004\003\023\061\105\156\164\162\165
\163\164\056\156\145\164\040\123\145\143\165\162\145\040\123\145
\162\166\145\162\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\060\201\237\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201
\215\000\060\201\211\002\201\201\000\307\301\137\116\161\361\316
\360\140\206\017\322\130\177\323\063\227\055\027\242\165\060\265
\226\144\046\057\150\303\104\253\250\165\346\000\147\064\127\236
\145\307\042\233\163\346\323\335\010\016\067\125\252\045\106\201
\154\275\376\250\366\165\127\127\214\220\154\112\303\076\213\113
\103\012\311\021\126\232\232\047\042\231\317\125\236\141\331\002
\342\174\266\174\070\007\334\343\177\117\232\271\003\101\200\266
\165\147\023\013\237\350\127\066\310\135\000\066\336\146\024\332
\156\166\037\117\067\214\202\023\211\002\003\001\000\001\243\202
\001\244\060\202\001\240\060\021\006\011\140\206\110\001\206\370
\102\001\001\004\004\003\002\000\007\060\201\343\006\003\125\035
\037\004\201\333\060\201\330\060\201\325\240\201\322\240\201\317
\244\201\314\060\201\311\061\024\060\022\006\003\125\004\012\023
\013\105\156\164\162\165\163\164\056\156\145\164\061\077\060\075
\006\003\125\004\013\024\066\167\167\167\056\145\156\164\162\165
\163\164\056\156\145\164\057\123\123\114\137\103\120\123\040\151
\156\143\157\162\160\056\040\142\171\040\162\145\146\056\040\050
\154\151\155\151\164\163\040\154\151\141\142\056\051\061\045\060

\043\006\003\125\004\013\023\034\050\143\051\040\062\060\060\060
\040\105\156\164\162\165\163\164\056\156\145\164\040\114\151\155
\151\164\145\144\061\072\060\070\006\003\125\004\003\023\061\105
\156\164\162\165\163\164\056\156\145\164\040\123\145\143\165\162
\145\040\123\145\162\166\145\162\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\061\015\060\013\006\003\125\004\003\023\004\103\122\114\061\060
\053\006\003\125\035\020\004\044\060\042\200\017\062\060\060\060
\060\062\060\064\061\067\062\060\060\060\132\201\017\062\060\062
\060\060\062\060\064\061\067\065\060\060\060\132\060\013\006\003
\125\035\017\004\004\003\002\001\006\060\037\006\003\125\035\043
\004\030\060\026\200\024\313\154\300\153\343\273\076\313\374\042
\234\376\373\213\222\234\260\362\156\042\060\035\006\003\125\035
\016\004\026\004\024\313\154\300\153\343\273\076\313\374\042\234
\376\373\213\222\234\260\362\156\042\060\014\006\003\125\035\023
\004\005\060\003\001\001\377\060\035\006\011\052\206\110\206\366
\175\007\101\000\004\020\060\016\033\010\126\065\056\060\072\064
\056\060\003\002\004\220\060\015\006\011\052\206\110\206\367\015
\001\001\004\005\000\003\201\201\000\142\333\201\221\316\310\232
\167\102\057\354\275\047\243\123\017\120\033\352\116\222\360\251
\257\251\240\272\110\141\313\357\311\006\357\037\325\364\356\337
\126\055\346\312\152\031\163\252\123\276\222\263\120\002\266\205
\046\162\143\330\165\120\142\165\024\267\263\120\032\077\312\021
\000\013\205\105\151\155\266\245\256\121\341\112\334\202\077\154
\214\064\262\167\153\331\002\366\177\016\352\145\004\361\315\124
\312\272\311\314\340\204\367\310\076\021\227\323\140\011\030\274
\005\377\154\211\063\360\354\025\017

END

#

Trust for Certificate "Entrust.net Global Secure Server CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Entrust.net Global Secure Server CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\211\071\127\156\027\215\367\005\170\017\314\136\310\117\204\366
\045\072\110\223

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\235\146\152\314\377\325\365\103\264\277\214\026\321\053\250\231

END

CKA_ISSUER

MULTILINE_OCTAL

\060\201\272\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\077\060\075\006\003\125
\004\013\024\066\167\167\167\056\145\156\164\162\165\163\164\056

```
\156\145\164\057\123\123\114\137\103\120\123\040\151\156\143\157
\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151\155
\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006\003
\125\004\013\023\034\050\143\051\040\062\060\060\060\040\105\156
\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164\145
\144\061\072\060\070\006\003\125\004\003\023\061\105\156\164\162
\165\163\164\056\156\145\164\040\123\145\143\165\162\145\040\123
\145\162\166\145\162\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\101\165\164\150\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\004\070\233\021\074
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING

CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Entrust.net Global Secure Personal CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Entrust.net Global Secure Personal CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125
\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056
\156\145\164\057\107\103\103\101\137\103\120\123\040\151\156\143
\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\062\060\060\060\040\105
\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164
\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164
\162\165\163\164\056\156\145\164\040\103\154\151\145\156\164\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125
\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056
```

\156\145\164\057\107\103\103\101\137\103\120\123\040\151\156\143
\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\062\060\060\060\040\105
\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164
\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164
\162\165\163\164\056\156\145\164\040\103\154\151\145\156\164\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\004\070\236\366\344

END

CKA_VALUE

MULTILINE_OCTAL

\060\202\004\203\060\202\003\354\240\003\002\001\002\002\004\070
\236\366\344\060\015\006\011\052\206\110\206\367\015\001\001\004
\005\000\060\201\264\061\024\060\022\006\003\125\004\012\023\013
\105\156\164\162\165\163\164\056\156\145\164\061\100\060\076\006
\003\125\004\013\024\067\167\167\167\056\145\156\164\162\165\163
\164\056\156\145\164\057\107\103\103\101\137\103\120\123\040\151
\156\143\157\162\160\056\040\142\171\040\162\145\146\056\040\050
\154\151\155\151\164\163\040\154\151\141\142\056\051\061\045\060
\043\006\003\125\004\013\023\034\050\143\051\040\062\060\060\060
\040\105\156\164\162\165\163\164\056\156\145\164\040\114\151\155
\151\164\145\144\061\063\060\061\006\003\125\004\003\023\052\105
\156\164\162\165\163\164\056\156\145\164\040\103\154\151\145\156
\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\060\036\027\015\060\060\060
\062\060\067\061\066\061\066\064\060\132\027\015\062\060\060\062
\060\067\061\066\064\066\064\060\132\060\201\264\061\024\060\022
\006\003\125\004\012\023\013\105\156\164\162\165\163\164\056\156
\145\164\061\100\060\076\006\003\125\004\013\024\067\167\167\167
\056\145\156\164\162\165\163\164\056\156\145\164\057\107\103\103
\101\137\103\120\123\040\151\156\143\157\162\160\056\040\142\171
\040\162\145\146\056\040\050\154\151\155\151\164\163\040\154\151
\141\142\056\051\061\045\060\043\006\003\125\004\013\023\034\050
\143\051\040\062\060\060\060\040\105\156\164\162\165\163\164\056
\156\145\164\040\114\151\155\151\164\145\144\061\063\060\061\006
\003\125\004\003\023\052\105\156\164\162\165\163\164\056\156\145
\164\040\103\154\151\145\156\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\060\201\237\060\015\006\011\052\206\110\206\367\015\001\001\001
\005\000\003\201\215\000\060\201\211\002\201\201\000\223\164\264
\266\344\305\113\326\241\150\177\142\325\354\367\121\127\263\162
\112\230\365\320\211\311\255\143\315\115\065\121\152\204\324\255
\311\150\171\157\270\353\021\333\207\256\134\044\121\023\361\124
\045\204\257\051\053\237\343\200\342\331\313\335\306\105\111\064

\210\220\136\001\227\357\352\123\246\335\374\301\336\113\052\045
\344\351\065\372\125\005\006\345\211\172\352\244\021\127\073\374
\174\075\066\315\147\065\155\244\251\045\131\275\146\365\371\047
\344\225\147\326\077\222\200\136\362\064\175\053\205\002\003\001
\000\001\243\202\001\236\060\202\001\232\060\021\006\011\140\206
\110\001\206\370\102\001\001\004\004\003\002\000\007\060\201\335
\006\003\125\035\037\004\201\325\060\201\322\060\201\317\240\201
\314\240\201\311\244\201\306\060\201\303\061\024\060\022\006\003
\125\004\012\023\013\105\156\164\162\165\163\164\056\156\145\164
\061\100\060\076\006\003\125\004\013\024\067\167\167\167\056\145
\156\164\162\165\163\164\056\156\145\164\057\107\103\103\101\137
\103\120\123\040\151\156\143\157\162\160\056\040\142\171\040\162
\145\146\056\040\050\154\151\155\151\164\163\040\154\151\141\142
\056\051\061\045\060\043\006\003\125\004\013\023\034\050\143\051
\040\062\060\060\060\040\105\156\164\162\165\163\164\056\156\145
\164\040\114\151\155\151\164\145\144\061\063\060\061\006\003\125
\004\003\023\052\105\156\164\162\165\163\164\056\156\145\164\040
\103\154\151\145\156\164\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\015
\060\013\006\003\125\004\003\023\004\103\122\114\061\060\053\006
\003\125\035\020\004\044\060\042\200\017\062\060\060\060\060\062
\060\067\061\066\061\066\064\060\132\201\017\062\060\062\060\060
\062\060\067\061\066\064\066\064\060\132\060\013\006\003\125\035
\017\004\004\003\002\001\006\060\037\006\003\125\035\043\004\030
\060\026\200\024\204\213\164\375\305\215\300\377\047\155\040\067
\105\174\376\055\316\272\323\175\060\035\006\003\125\035\016\004
\026\004\024\204\213\164\375\305\215\300\377\047\155\040\067\105
\174\376\055\316\272\323\175\060\014\006\003\125\035\023\004\005
\060\003\001\001\377\060\035\006\011\052\206\110\206\366\175\007
\101\000\004\020\060\016\033\010\126\065\056\060\072\064\056\060
\003\002\004\220\060\015\006\011\052\206\110\206\367\015\001\001
\004\005\000\003\201\201\000\116\157\065\200\073\321\212\365\016
\247\040\313\055\145\125\320\222\364\347\204\265\006\046\203\022
\204\013\254\073\262\104\356\275\317\100\333\040\016\272\156\024
\352\060\340\073\142\174\177\213\153\174\112\247\325\065\074\276
\250\134\352\113\273\223\216\200\146\253\017\051\375\115\055\277
\032\233\012\220\305\253\332\321\263\206\324\057\044\122\134\172
\155\306\362\376\345\115\032\060\214\220\362\272\327\112\076\103
\176\324\310\120\032\207\370\117\201\307\166\013\204\072\162\235
\316\145\146\227\256\046\136

END

#

Trust for Certificate "Entrust.net Global Secure Personal CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE

```

CKA_LABEL UTF8 "Entrust.net Global Secure Personal CA"
CKA_CERT_SHA1_HASH
MULTILINE_OCTAL
\317\164\277\377\233\206\201\133\010\063\124\100\066\076\207\266
\266\360\277\163
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\232\167\031\030\355\226\317\337\033\267\016\365\215\271\210\056
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\264\061\024\060\022\006\003\125\004\012\023\013\105\156
\164\162\165\163\164\056\156\145\164\061\100\060\076\006\003\125
\004\013\024\067\167\167\167\056\145\156\164\162\165\163\164\056
\156\145\164\057\107\103\103\101\137\103\120\123\040\151\156\143
\157\162\160\056\040\142\171\040\162\145\146\056\040\050\154\151
\155\151\164\163\040\154\151\141\142\056\051\061\045\060\043\006
\003\125\004\013\023\034\050\143\051\040\062\060\060\060\040\105
\156\164\162\165\163\164\056\156\145\164\040\114\151\155\151\164
\145\144\061\063\060\061\006\003\125\004\003\023\052\105\156\164
\162\165\163\164\056\156\145\164\040\103\154\151\145\156\164\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\070\236\366\344
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Entrust Root Certification Authority"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Entrust Root Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\260\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\120\123\040\151\163\040\151\156\143\157\162\160
\157\162\141\164\145\144\040\142\171\040\162\145\146\145\162\145

```

\156\143\145\061\037\060\035\006\003\125\004\013\023\026\050\143
\051\040\062\060\060\066\040\105\156\164\162\165\163\164\054\040
\111\156\143\056\061\055\060\053\006\003\125\004\003\023\044\105
\156\164\162\165\163\164\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\260\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\120\123\040\151\163\040\151\156\143\157\162\160
\157\162\141\164\145\144\040\142\171\040\162\145\146\145\162\145
\156\143\145\061\037\060\035\006\003\125\004\013\023\026\050\143
\051\040\062\060\060\066\040\105\156\164\162\165\163\164\054\040
\111\156\143\056\061\055\060\053\006\003\125\004\003\023\044\105
\156\164\162\165\163\164\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\004\105\153\120\124

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\221\060\202\003\171\240\003\002\001\002\002\004\105
\153\120\124\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\201\260\061\013\060\011\006\003\125\004\006\023\002
\125\123\061\026\060\024\006\003\125\004\012\023\015\105\156\164
\162\165\163\164\054\040\111\156\143\056\061\071\060\067\006\003
\125\004\013\023\060\167\167\167\056\145\156\164\162\165\163\164
\056\156\145\164\057\103\120\123\040\151\163\040\151\156\143\157
\162\160\157\162\141\164\145\144\040\142\171\040\162\145\146\145
\162\145\156\143\145\061\037\060\035\006\003\125\004\013\023\026
\050\143\051\040\062\060\060\066\040\105\156\164\162\165\163\164
\054\040\111\156\143\056\061\055\060\053\006\003\125\004\003\023
\044\105\156\164\162\165\163\164\040\122\157\157\164\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171\060\036\027\015\060\066\061\061\062\067\062
\060\062\063\064\062\132\027\015\062\066\061\061\062\067\062\060
\065\063\064\062\132\060\201\260\061\013\060\011\006\003\125\004
\006\023\002\125\123\061\026\060\024\006\003\125\004\012\023\015
\105\156\164\162\165\163\164\054\040\111\156\143\056\061\071\060
\067\006\003\125\004\013\023\060\167\167\167\056\145\156\164\162
\165\163\164\056\156\145\164\057\103\120\123\040\151\163\040\151

\156\143\157\162\160\157\162\141\164\145\144\040\142\171\040\162
\145\146\145\162\145\156\143\145\061\037\060\035\006\003\125\004
\013\023\026\050\143\051\040\062\060\060\066\040\105\156\164\162
\165\163\164\054\040\111\156\143\056\061\055\060\053\006\003\125
\004\003\023\044\105\156\164\162\165\163\164\040\122\157\157\164
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\266\225\266\103\102\372\306
\155\052\157\110\337\224\114\071\127\005\356\303\171\021\101\150
\066\355\354\376\232\001\217\241\070\050\374\367\020\106\146\056
\115\036\032\261\032\116\306\321\300\225\210\260\311\377\061\213
\063\003\333\267\203\173\076\040\204\136\355\262\126\050\247\370
\340\271\100\161\067\305\313\107\016\227\052\150\300\042\225\142
\025\333\107\331\365\320\053\377\202\113\311\255\076\336\114\333
\220\200\120\077\011\212\204\000\354\060\012\075\030\315\373\375
\052\131\232\043\225\027\054\105\236\037\156\103\171\155\014\134
\230\376\110\247\305\043\107\134\136\375\156\347\036\264\366\150
\105\321\206\203\133\242\212\215\261\343\051\200\376\045\161\210
\255\276\274\217\254\122\226\113\252\121\215\344\023\061\031\350
\116\115\237\333\254\263\152\325\274\071\124\161\312\172\172\177
\220\335\175\035\200\331\201\273\131\046\302\021\376\346\223\342
\367\200\344\145\373\064\067\016\051\200\160\115\257\070\206\056
\236\177\127\257\236\027\256\353\034\313\050\041\137\266\034\330
\347\242\004\042\371\323\332\330\313\002\003\001\000\001\243\201
\260\060\201\255\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\006\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\053\006\003\125\035\020\004\044\060\042
\200\017\062\060\060\066\061\061\062\067\062\060\062\063\064\062
\132\201\017\062\060\062\066\061\061\062\067\062\060\065\063\064
\062\132\060\037\006\003\125\035\043\004\030\060\026\200\024\150
\220\344\147\244\246\123\200\307\206\146\244\361\367\113\103\373
\204\275\155\060\035\006\003\125\035\016\004\026\004\024\150\220
\344\147\244\246\123\200\307\206\146\244\361\367\113\103\373\204
\275\155\060\035\006\011\052\206\110\206\366\175\007\101\000\004
\020\060\016\033\010\126\067\056\061\072\064\056\060\003\002\004
\220\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\202\001\001\000\223\324\060\260\327\003\040\052\320\371\143
\350\221\014\005\040\251\137\031\312\173\162\116\324\261\333\320
\226\373\124\132\031\054\014\010\367\262\274\205\250\235\177\155
\073\122\263\052\333\347\324\204\214\143\366\017\313\046\001\221
\120\154\364\137\024\342\223\164\300\023\236\060\072\120\343\264
\140\305\034\360\042\104\215\161\107\254\310\032\311\351\233\232
\000\140\023\377\160\176\137\021\115\111\033\263\025\122\173\311
\124\332\277\235\225\257\153\232\330\236\351\361\344\103\215\342
\021\104\072\277\257\275\203\102\163\122\213\252\273\247\051\317
\365\144\034\012\115\321\274\252\254\237\052\320\377\177\177\332
\175\352\261\355\060\045\301\204\332\064\322\133\170\203\126\354

```
\234\066\303\046\342\021\366\147\111\035\222\253\214\373\353\377
\172\356\205\112\247\120\200\360\247\134\112\224\056\137\005\231
\074\122\101\340\315\264\143\317\001\103\272\234\203\334\217\140
\073\363\132\264\264\173\256\332\013\220\070\165\357\201\035\146
\322\367\127\160\066\263\277\374\050\257\161\045\205\133\023\376
\036\177\132\264\074
```

END

#

Trust for Certificate

"Entrust Root Certification Authority"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Entrust Root Certification Authority"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\263\036\261\267\100\343\154\204\002\332\334\067\324\115\365\324
\147\111\122\371
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\326\245\303\355\135\335\076\000\301\075\207\222\037\035\077\344
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\260\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\105\156\164\162\165
\163\164\054\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\167\167\167\056\145\156\164\162\165\163\164\056\156
\145\164\057\103\120\123\040\151\163\040\151\156\143\157\162\160
\157\162\141\164\145\144\040\142\171\040\162\145\146\145\162\145
\156\143\145\061\037\060\035\006\003\125\004\013\023\026\050\143
\051\040\062\060\060\066\040\105\156\164\162\165\163\164\054\040
\111\156\143\056\061\055\060\053\006\003\125\004\003\023\044\105
\156\164\162\165\163\164\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\004\105\153\120\124
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "AOL Time Warner Root Certification Authority 1"

```
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AOL Time Warner Root Certification Authority 1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124
\151\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061
\034\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060
\065\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145
\040\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\061
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124
\151\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061
\034\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060
\065\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145
\040\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\061
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\346\060\202\002\316\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124\151
\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061\034
\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143\141
\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060\065
\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145\040
\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\061\060\036\027\015\060\062\060\065\062\071\060
\066\060\060\060\060\132\027\015\063\067\061\061\062\060\061\065
```

\060\063\060\060\132\060\201\203\061\013\060\011\006\003\125\004
\006\023\002\125\123\061\035\060\033\006\003\125\004\012\023\024
\101\117\114\040\124\151\155\145\040\127\141\162\156\145\162\040
\111\156\143\056\061\034\060\032\006\003\125\004\013\023\023\101
\155\145\162\151\143\141\040\117\156\154\151\156\145\040\111\156
\143\056\061\067\060\065\006\003\125\004\003\023\056\101\117\114
\040\124\151\155\145\040\127\141\162\156\145\162\040\122\157\157
\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\040\061\060\202\001\042\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202
\001\017\000\060\202\001\012\002\202\001\001\000\231\336\217\303
\045\243\151\064\350\005\367\164\271\277\132\227\031\271\057\224
\322\223\345\055\211\312\204\174\077\020\103\033\214\213\174\204
\130\370\044\174\110\317\052\375\300\025\331\030\176\204\032\027
\323\333\236\327\312\344\331\327\252\130\121\207\360\360\213\110
\116\342\302\304\131\151\060\142\266\060\242\214\013\021\231\141
\065\155\176\357\305\261\031\006\040\022\216\102\341\337\017\226
\020\122\250\317\234\137\225\024\330\257\073\165\013\061\040\037
\104\057\242\142\101\263\273\030\041\333\312\161\074\214\354\266
\271\015\237\357\121\357\115\173\022\362\013\014\341\254\100\217
\167\177\260\312\170\161\014\135\026\161\160\242\327\302\072\205
\315\016\232\304\340\000\260\325\045\352\334\053\344\224\055\070
\234\211\101\127\144\050\145\031\034\266\104\264\310\061\153\216
\001\173\166\131\045\177\025\034\204\010\174\163\145\040\012\241
\004\056\032\062\250\232\040\261\234\054\041\131\347\373\317\356
\160\055\010\312\143\076\054\233\223\031\152\244\302\227\377\267
\206\127\210\205\154\236\025\026\053\115\054\263\002\003\001\000
\001\243\143\060\141\060\017\006\003\125\035\023\001\001\377\004
\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004
\024\241\066\060\026\313\206\220\000\105\200\123\261\217\310\330
\075\174\276\137\022\060\037\006\003\125\035\043\004\030\060\026
\200\024\241\066\060\026\313\206\220\000\105\200\123\261\217\310
\330\075\174\276\137\022\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\206\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\001\001\000\212\040\030\245\276\263
\057\264\246\204\000\100\060\051\372\264\024\163\114\171\105\247
\366\160\340\350\176\144\036\012\225\174\152\141\302\357\116\037
\276\377\311\231\037\007\141\112\341\135\114\315\255\356\320\122
\062\331\131\062\274\332\171\162\326\173\011\350\002\201\065\323
\012\337\021\035\311\171\240\200\115\376\132\327\126\326\355\017
\052\257\247\030\165\063\014\352\301\141\005\117\152\232\211\362
\215\271\237\056\357\260\137\132\000\353\276\255\240\370\104\005
\147\274\313\004\357\236\144\305\351\310\077\005\277\306\057\007
\034\303\066\161\206\312\070\146\112\315\326\270\113\306\154\247
\227\073\372\023\055\156\043\141\207\241\143\102\254\302\313\227
\237\141\150\317\055\114\004\235\327\045\117\012\016\115\220\213
\030\126\250\223\110\127\334\157\256\275\236\147\127\167\211\120
\263\276\021\233\105\147\203\206\031\207\323\230\275\010\032\026

```
\037\130\202\013\341\226\151\005\113\216\354\203\121\061\007\325
\324\237\377\131\173\250\156\205\317\323\113\251\111\260\137\260
\071\050\150\016\163\335\045\232\336\022
END
```

```
#
```

```
Trust for Certificate "AOL Time Warner Root Certification Authority 1"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "AOL Time Warner Root Certification Authority 1"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\164\124\123\134\044\243\247\130\040\176\076\076\323\044\370\026
\373\041\026\111
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

```
\347\172\334\261\037\156\006\037\164\154\131\026\047\303\113\300
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124
\151\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061
\034\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060
\065\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145
\040\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\061
```

```
END
```

```
CKA_SERIAL_NUMBER
```

```
MULTILINE_OCTAL
```

```
\002\001\001
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "AOL Time Warner Root Certification Authority 2"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "AOL Time Warner Root Certification Authority 2"
```

```
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```


CKA_SUBJECT MULTILINE_OCTAL

\060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124
\151\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061
\034\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060
\065\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145
\040\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\062

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124
\151\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061
\034\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060
\065\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145
\040\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\062

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\346\060\202\003\316\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124\151
\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061\034
\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143\141
\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060\065
\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145\040
\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\062\060\036\027\015\060\062\060\065\062\071\060
\066\060\060\060\060\132\027\015\063\067\060\071\062\070\062\063
\064\063\060\060\132\060\201\203\061\013\060\011\006\003\125\004
\006\023\002\125\123\061\035\060\033\006\003\125\004\012\023\024
\101\117\114\040\124\151\155\145\040\127\141\162\156\145\162\040
\111\156\143\056\061\034\060\032\006\003\125\004\013\023\023\101
\155\145\162\151\143\141\040\117\156\154\151\156\145\040\111\156
\143\056\061\067\060\065\006\003\125\004\003\023\056\101\117\114
\040\124\151\155\145\040\127\141\162\156\145\162\040\122\157\157

\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\040\062\060\202\002\042\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202
\002\017\000\060\202\002\012\002\202\002\001\000\264\067\132\010
\026\231\024\350\125\261\033\044\153\374\307\213\346\207\251\211
\356\213\231\315\117\100\206\244\266\115\311\331\261\334\074\115
\015\205\114\025\154\106\213\122\170\237\370\043\375\147\365\044
\072\150\135\320\367\144\141\101\124\243\213\245\010\322\051\133
\233\140\117\046\203\321\143\022\126\111\166\244\026\302\245\235
\105\254\213\204\225\250\026\261\354\237\352\044\032\357\271\127
\134\232\044\041\054\115\016\161\037\246\254\135\105\164\003\230
\304\124\214\026\112\101\167\206\225\165\014\107\001\146\140\374
\025\361\017\352\365\024\170\307\016\327\156\201\034\136\277\136
\347\072\052\330\227\027\060\174\000\255\010\235\063\257\270\231
\141\200\213\250\225\176\024\334\022\154\244\320\330\357\100\111
\002\066\371\156\251\326\035\226\126\004\262\263\055\026\126\206
\217\331\040\127\200\315\147\020\155\260\114\360\332\106\266\352
\045\056\106\257\215\260\205\070\064\213\024\046\202\053\254\256
\231\013\216\024\327\122\275\236\151\303\206\002\013\352\166\165
\061\011\316\063\031\041\205\103\346\211\055\237\045\067\147\361
\043\152\322\000\155\227\371\237\347\051\312\335\037\327\006\352
\270\311\271\011\041\237\310\077\006\305\322\351\022\106\000\116
\173\010\353\102\075\053\110\156\235\147\335\113\002\344\104\363
\223\031\245\047\316\151\172\276\147\323\374\120\244\054\253\303
\153\271\343\200\114\317\005\141\113\053\334\033\271\246\322\320
\252\365\053\163\373\316\220\065\237\014\122\034\277\134\041\141
\021\133\025\113\251\044\121\374\244\134\367\027\235\260\322\372
\007\351\217\126\344\032\214\150\212\004\323\174\132\343\236\242
\241\312\161\133\242\324\240\347\051\205\135\003\150\052\117\322
\006\327\075\371\303\003\057\077\145\371\147\036\107\100\323\143
\017\343\325\216\371\205\253\227\114\263\327\046\353\226\012\224
\336\205\066\234\310\177\201\011\002\111\052\016\365\144\062\014
\202\321\272\152\202\033\263\113\164\021\363\214\167\326\237\277
\334\067\244\247\125\004\057\324\061\350\323\106\271\003\174\332
\022\116\131\144\267\121\061\061\120\240\312\034\047\331\020\056
\255\326\275\020\146\053\303\260\042\112\022\133\002\003\001\000
\001\243\143\060\141\060\017\006\003\125\035\023\001\001\377\004
\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004
\024\117\151\155\003\176\235\237\007\030\103\274\267\020\116\325
\277\251\304\040\050\060\037\006\003\125\035\043\004\030\060\026
\200\024\117\151\155\003\176\235\237\007\030\103\274\267\020\116
\325\277\251\304\040\050\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\206\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\002\001\000\073\363\256\312\350\056
\207\205\373\145\131\347\255\021\024\245\127\274\130\237\044\022
\127\273\373\077\064\332\356\255\172\052\064\162\160\061\153\307
\031\230\200\311\202\336\067\167\136\124\213\216\362\352\147\117
\311\164\204\221\126\011\325\345\172\232\201\266\201\302\255\066

```
\344\361\124\021\123\363\064\105\001\046\310\345\032\274\064\104
\041\336\255\045\374\166\026\167\041\220\200\230\127\235\116\352
\354\057\252\074\024\173\127\301\176\030\024\147\356\044\306\275
\272\025\260\322\030\275\267\125\201\254\123\300\350\335\151\022
\023\102\267\002\265\005\101\312\171\120\156\202\016\161\162\223
\106\350\235\015\135\275\256\316\051\255\143\325\125\026\200\060
\047\377\166\272\367\270\326\112\343\331\265\371\122\320\116\100
\251\307\345\302\062\307\252\166\044\341\153\005\120\353\305\277
\012\124\345\271\102\074\044\373\267\007\234\060\237\171\132\346
\340\100\122\025\364\374\252\364\126\371\104\227\207\355\016\145
\162\136\276\046\373\115\244\055\010\007\336\330\134\240\334\201
\063\231\030\045\021\167\247\353\375\130\011\054\231\153\033\212
\363\122\077\032\115\110\140\361\240\366\063\002\123\213\355\045
\011\270\015\055\355\227\163\354\327\226\037\216\140\016\332\020
\233\057\030\044\366\246\115\012\371\073\313\165\302\314\057\316
\044\151\311\012\042\216\131\247\367\202\014\327\327\153\065\234
\103\000\152\304\225\147\272\234\105\313\270\016\067\367\334\116
\001\117\276\012\266\003\323\255\212\105\367\332\047\115\051\261
\110\337\344\021\344\226\106\275\154\002\076\326\121\310\225\027
\001\025\251\362\252\252\362\277\057\145\033\157\320\271\032\223
\365\216\065\304\200\207\076\224\057\146\344\351\250\377\101\234
\160\052\117\052\071\030\225\036\176\373\141\001\074\121\010\056
\050\030\244\026\017\061\375\072\154\043\223\040\166\341\375\007
\205\321\133\077\322\034\163\062\335\372\271\370\214\317\002\207
\172\232\226\344\355\117\211\215\123\103\253\016\023\300\001\025
\264\171\070\333\374\156\075\236\121\266\270\023\213\147\317\371
\174\331\042\035\366\135\305\034\001\057\230\350\172\044\030\274
\204\327\372\334\162\133\367\301\072\150
```

END

#

Trust for Certificate "AOL Time Warner Root Certification Authority 2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "AOL Time Warner Root Certification Authority 2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\374\041\232\166\021\057\166\301\305\010\203\074\232\057\242\272
\204\254\010\172
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\001\132\231\303\326\117\251\113\074\073\261\243\253\047\114\277
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\203\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\035\060\033\006\003\125\004\012\023\024\101\117\114\040\124
\151\155\145\040\127\141\162\156\145\162\040\111\156\143\056\061
```

```

\034\060\032\006\003\125\004\013\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\067\060
\065\006\003\125\004\003\023\056\101\117\114\040\124\151\155\145
\040\127\141\162\156\145\162\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\062
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "beTRUSTed Root CA-Baltimore Implementation"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "beTRUSTed Root CA-Baltimore Implementation"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\146\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\063\060\061\006\003\125\004\003\023\052\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\055
\102\141\154\164\151\155\157\162\145\040\111\155\160\154\145\155
\145\156\164\141\164\151\157\156
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\146\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\063\060\061\006\003\125\004\003\023\052\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\055
\102\141\154\164\151\155\157\162\145\040\111\155\160\154\145\155
\145\156\164\141\164\151\157\156
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\074\265\075\106
END

```

CKA_VALUE MULTILINE_OCTAL

\060\202\005\152\060\202\004\122\240\003\002\001\002\002\004\074
\265\075\106\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\146\061\022\060\020\006\003\125\004\012\023\011\142
\145\124\122\125\123\124\145\144\061\033\060\031\006\003\125\004
\013\023\022\142\145\124\122\125\123\124\145\144\040\122\157\157
\164\040\103\101\163\061\063\060\061\006\003\125\004\003\023\052
\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040\103
\101\055\102\141\154\164\151\155\157\162\145\040\111\155\160\154
\145\155\145\156\164\141\164\151\157\156\060\036\027\015\060\062
\060\064\061\061\060\067\063\070\065\061\132\027\015\062\062\060
\064\061\061\060\067\063\070\065\061\132\060\146\061\022\060\020
\006\003\125\004\012\023\011\142\145\124\122\125\123\124\145\144
\061\033\060\031\006\003\125\004\013\023\022\142\145\124\122\125
\123\124\145\144\040\122\157\157\164\040\103\101\163\061\063\060
\061\006\003\125\004\003\023\052\142\145\124\122\125\123\124\145
\144\040\122\157\157\164\040\103\101\055\102\141\154\164\151\155
\157\162\145\040\111\155\160\154\145\155\145\156\164\141\164\151
\157\156\060\202\001\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202
\001\001\000\274\176\304\071\234\214\343\326\034\206\377\312\142
\255\340\177\060\105\172\216\032\263\270\307\371\321\066\377\042
\363\116\152\137\204\020\373\146\201\303\224\171\061\322\221\341
\167\216\030\052\303\024\336\121\365\117\243\053\274\030\026\342
\265\335\171\336\042\370\202\176\313\201\037\375\047\054\217\372
\227\144\042\216\370\377\141\243\234\033\036\222\217\300\250\011
\337\011\021\354\267\175\061\232\032\352\203\041\006\074\237\272
\134\377\224\352\152\270\303\153\125\064\117\075\062\037\335\201
\024\340\304\074\315\235\060\370\060\251\227\323\356\314\243\320
\037\137\034\023\201\324\030\253\224\321\143\303\236\177\065\222
\236\137\104\352\354\364\042\134\267\350\075\175\244\371\211\251
\221\262\052\331\353\063\207\356\245\375\343\332\314\210\346\211
\046\156\307\053\202\320\136\235\131\333\024\354\221\203\005\303
\136\016\306\052\320\004\335\161\075\040\116\130\047\374\123\373
\170\170\031\024\262\374\220\122\211\070\142\140\007\264\240\354
\254\153\120\326\375\271\050\153\357\122\055\072\262\377\361\001
\100\254\067\002\003\001\000\001\243\202\002\036\060\202\002\032
\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001
\377\060\202\001\265\006\003\125\035\040\004\202\001\254\060\202
\001\250\060\202\001\244\006\017\053\006\001\004\001\261\076\000
\000\001\011\050\203\221\061\060\202\001\217\060\202\001\110\006
\010\053\006\001\005\005\007\002\002\060\202\001\072\032\202\001
\066\122\145\154\151\141\156\143\145\040\157\156\040\157\162\040
\165\163\145\040\157\146\040\164\150\151\163\040\103\145\162\164
\151\146\151\143\141\164\145\040\143\162\145\141\164\145\163\040
\141\156\040\141\143\153\156\157\167\154\145\144\147\155\145\156
\164\040\141\156\144\040\141\143\143\145\160\164\141\156\143\145
\040\157\146\040\164\150\145\040\164\150\145\156\040\141\160\160

\154\151\143\141\142\154\145\040\163\164\141\156\144\141\162\144
\040\164\145\162\155\163\040\141\156\144\040\143\157\156\144\151
\164\151\157\156\163\040\157\146\040\165\163\145\054\040\164\150
\145\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\120\162\141\143\164\151\143\145\040\123\164\141\164\145\155\145
\156\164\040\141\156\144\040\164\150\145\040\122\145\154\171\151
\156\147\040\120\141\162\164\171\040\101\147\162\145\145\155\145
\156\164\054\040\167\150\151\143\150\040\143\141\156\040\142\145
\040\146\157\165\156\144\040\141\164\040\164\150\145\040\142\145
\124\122\125\123\124\145\144\040\167\145\142\040\163\151\164\145
\054\040\150\164\164\160\072\057\057\167\167\167\056\142\145\164
\162\165\163\164\145\144\056\143\157\155\057\160\162\157\144\165
\143\164\163\137\163\145\162\166\151\143\145\163\057\151\156\144
\145\170\056\150\164\155\154\060\101\006\010\053\006\001\005\005
\007\002\001\026\065\150\164\164\160\072\057\057\167\167\167\056
\142\145\164\162\165\163\164\145\144\056\143\157\155\057\160\162
\157\144\165\143\164\163\137\163\145\162\166\151\143\145\163\057
\151\156\144\145\170\056\150\164\155\154\060\035\006\003\125\035
\016\004\026\004\024\105\075\303\251\321\334\077\044\126\230\034
\163\030\210\152\377\203\107\355\266\060\037\006\003\125\035\043
\004\030\060\026\200\024\105\075\303\251\321\334\077\044\126\230
\034\163\030\210\152\377\203\107\355\266\060\016\006\003\125\035
\017\001\001\377\004\004\003\002\001\006\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\111\222
\274\243\356\254\275\372\015\311\213\171\206\034\043\166\260\200
\131\167\374\332\177\264\113\337\303\144\113\152\116\016\255\362
\175\131\167\005\255\012\211\163\260\372\274\313\334\215\000\210
\217\246\240\262\352\254\122\047\277\241\110\174\227\020\173\272
\355\023\035\232\007\156\313\061\142\022\350\143\003\252\175\155
\343\370\033\166\041\170\033\237\113\103\214\323\111\206\366\033
\134\366\056\140\025\323\351\343\173\165\077\320\002\203\320\030
\202\101\315\145\067\352\216\062\176\275\153\231\135\060\021\310
\333\110\124\034\073\341\247\023\323\152\110\223\367\075\214\177
\005\350\316\363\210\052\143\004\270\352\176\130\174\001\173\133
\341\305\175\357\041\340\215\016\135\121\175\261\147\375\243\275
\070\066\306\362\070\206\207\032\226\150\140\106\373\050\024\107
\125\341\247\200\014\153\342\352\337\115\174\220\110\240\066\275
\011\027\211\177\303\362\323\234\234\343\335\304\033\335\365\267
\161\263\123\005\211\006\320\313\112\200\301\310\123\220\265\074
\061\210\027\120\237\311\304\016\213\330\250\002\143\015

END

#

Trust for Certificate "beTRUSTed Root CA-Baltimore Implementation"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE

```

CKA_LABEL UTF8 "beTRUSTed Root CA-Baltimore Implementation"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\334\273\236\267\031\113\304\162\005\301\021\165\051\206\203\133
\123\312\344\370
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\201\065\271\373\373\022\312\030\151\066\353\256\151\170\241\361
END
CKA_ISSUER
MULTILINE_OCTAL
\060\146\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\063\060\061\006\003\125\004\003\023\052\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\055
\102\141\154\164\151\155\157\162\145\040\111\155\160\154\145\155
\145\156\164\141\164\151\157\156
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\074\265\075\106
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "beTRUSTed Root CA - Entrust Implementation"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "beTRUSTed
Root CA - Entrust Implementation"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\146\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\063\060\061\006\003\125\004\003\023\052\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\040
\055\040\105\156\164\162\165\163\164\040\111\155\160\154\145\155
\145\156\164\141\164\151\157\156
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\146\061\022\060\020\006\003\125\004\012\023\011\142\145\124

```

\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\063\060\061\006\003\125\004\003\023\052\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\040
\055\040\105\156\164\162\165\163\164\040\111\155\160\154\145\155
\145\156\164\141\164\151\157\156

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\004\074\265\117\100

END

CKA_VALUE MULTILINE_OCTAL

\060\202\006\121\060\202\005\071\240\003\002\001\002\002\004\074
\265\117\100\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\146\061\022\060\020\006\003\125\004\012\023\011\142
\145\124\122\125\123\124\145\144\061\033\060\031\006\003\125\004
\013\023\022\142\145\124\122\125\123\124\145\144\040\122\157\157
\164\040\103\101\163\061\063\060\061\006\003\125\004\003\023\052
\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040\103
\101\040\055\040\105\156\164\162\165\163\164\040\111\155\160\154
\145\155\145\156\164\141\164\151\157\156\060\036\027\015\060\062
\060\064\061\061\060\070\062\064\062\067\132\027\015\062\062\060
\064\061\061\060\070\065\064\062\067\132\060\146\061\022\060\020
\006\003\125\004\012\023\011\142\145\124\122\125\123\124\145\144
\061\033\060\031\006\003\125\004\013\023\022\142\145\124\122\125
\123\124\145\144\040\122\157\157\164\040\103\101\163\061\063\060
\061\006\003\125\004\003\023\052\142\145\124\122\125\123\124\145
\144\040\122\157\157\164\040\103\101\040\055\040\105\156\164\162
\165\163\164\040\111\155\160\154\145\155\145\156\164\141\164\151
\157\156\060\202\001\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202
\001\001\000\272\364\104\003\252\022\152\265\103\354\125\222\266
\060\175\065\127\014\333\363\015\047\156\114\367\120\250\233\116
\053\157\333\365\255\034\113\135\263\251\301\376\173\104\353\133
\243\005\015\037\305\064\053\060\000\051\361\170\100\262\244\377
\072\364\001\210\027\176\346\324\046\323\272\114\352\062\373\103
\167\227\207\043\305\333\103\243\365\052\243\121\136\341\073\322
\145\151\176\125\025\233\172\347\151\367\104\340\127\265\025\350
\146\140\017\015\003\373\202\216\243\350\021\173\154\276\307\143
\016\027\223\337\317\113\256\156\163\165\340\363\252\271\244\300
\011\033\205\352\161\051\210\101\062\371\360\052\016\154\011\362
\164\153\146\154\122\023\037\030\274\324\076\367\330\156\040\236
\312\376\374\041\224\356\023\050\113\327\134\136\014\146\356\351
\273\017\301\064\261\177\010\166\363\075\046\160\311\213\045\035
\142\044\014\352\034\165\116\300\022\344\272\023\035\060\051\055
\126\063\005\273\227\131\176\306\111\117\211\327\057\044\250\266
\210\100\265\144\222\123\126\044\344\242\240\205\263\136\220\264
\022\063\315\002\003\001\000\001\243\202\003\005\060\202\003\001

\060\202\001\267\006\003\125\035\040\004\202\001\256\060\202\001
\252\060\202\001\246\006\017\053\006\001\004\001\261\076\000\000
\002\011\050\203\221\061\060\202\001\221\060\202\001\111\006\010
\053\006\001\005\005\007\002\002\060\202\001\073\032\202\001\067
\122\145\154\151\141\156\143\145\040\157\156\040\157\162\040\165
\163\145\040\157\146\040\164\150\151\163\040\103\145\162\164\151
\146\151\143\141\164\145\040\143\162\145\141\164\145\163\040\141
\156\040\141\143\153\156\157\167\154\145\144\147\155\145\156\164
\040\141\156\144\040\141\143\143\145\160\164\141\156\143\145\040
\157\146\040\164\150\145\040\164\150\145\156\040\141\160\160\154
\151\143\141\142\154\145\040\163\164\141\156\144\141\162\144\040
\164\145\162\155\163\040\141\156\144\040\143\157\156\144\151\164
\151\157\156\163\040\157\146\040\165\163\145\054\040\164\150\145
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\120
\162\141\143\164\151\143\145\040\123\164\141\164\145\155\145\156
\164\040\141\156\144\040\164\150\145\040\122\145\154\171\151\156
\147\040\120\141\162\164\171\040\101\147\162\145\145\155\145\156
\164\054\040\167\150\151\143\150\040\143\141\156\040\142\145\040
\146\157\165\156\144\040\141\164\040\164\150\145\040\142\145\124
\122\125\123\124\145\144\040\167\145\142\040\163\151\164\145\054
\040\150\164\164\160\163\072\057\057\167\167\167\056\142\145\164
\162\165\163\164\145\144\056\143\157\155\057\160\162\157\144\165
\143\164\163\137\163\145\162\166\151\143\145\163\057\151\156\144
\145\170\056\150\164\155\154\060\102\006\010\053\006\001\005\005
\007\002\001\026\066\150\164\164\160\163\072\057\057\167\167\167
\056\142\145\164\162\165\163\164\145\144\056\143\157\155\057\160
\162\157\144\165\143\164\163\137\163\145\162\166\151\143\145\163
\057\151\156\144\145\170\056\150\164\155\154\060\021\006\011\140
\206\110\001\206\370\102\001\001\004\004\003\002\000\007\060\201
\211\006\003\125\035\037\004\201\201\060\177\060\175\240\173\240
\171\244\167\060\165\061\022\060\020\006\003\125\004\012\023\011
\142\145\124\122\125\123\124\145\144\061\033\060\031\006\003\125
\004\013\023\022\142\145\124\122\125\123\124\145\144\040\122\157
\157\164\040\103\101\163\061\063\060\061\006\003\125\004\003\023
\052\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\040\055\040\105\156\164\162\165\163\164\040\111\155\160
\154\145\155\145\156\164\141\164\151\157\156\061\015\060\013\006
\003\125\004\003\023\004\103\122\114\061\060\053\006\003\125\035
\020\004\044\060\042\200\017\062\060\060\062\060\064\061\061\060
\070\062\064\062\067\132\201\017\062\060\062\062\060\064\061\061
\060\070\065\064\062\067\132\060\013\006\003\125\035\017\004\004
\003\002\001\006\060\037\006\003\125\035\043\004\030\060\026\200
\024\175\160\345\256\070\213\006\077\252\034\032\217\371\317\044
\060\252\204\204\026\060\035\006\003\125\035\016\004\026\004\024
\175\160\345\256\070\213\006\077\252\034\032\217\371\317\044\060
\252\204\204\026\060\014\006\003\125\035\023\004\005\060\003\001
\001\377\060\035\006\011\052\206\110\206\366\175\007\101\000\004
\020\060\016\033\010\126\066\056\060\072\064\056\060\003\002\004

```
\220\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\202\001\001\000\052\270\027\316\037\020\224\353\270\232\267
\271\137\354\332\367\222\044\254\334\222\073\307\040\215\362\231
\345\135\070\241\302\064\355\305\023\131\134\005\265\053\117\141
\233\221\373\101\374\374\325\074\115\230\166\006\365\201\175\353
\335\220\346\321\126\124\332\343\055\014\237\021\062\224\042\001
\172\366\154\054\164\147\004\314\245\217\216\054\263\103\265\224
\242\320\175\351\142\177\006\276\047\001\203\236\072\375\212\356
\230\103\112\153\327\265\227\073\072\277\117\155\264\143\372\063
\000\064\056\055\155\226\311\173\312\231\143\272\276\364\366\060
\240\055\230\226\351\126\104\005\251\104\243\141\020\353\202\241
\147\135\274\135\047\165\252\212\050\066\052\070\222\331\335\244
\136\000\245\314\314\174\051\052\336\050\220\253\267\341\266\377
\175\045\013\100\330\252\064\243\055\336\007\353\137\316\012\335
\312\176\072\175\046\301\142\150\072\346\057\067\363\201\206\041
\304\251\144\252\357\105\066\321\032\146\174\370\351\067\326\326
\141\276\242\255\110\347\337\346\164\376\323\155\175\322\045\334
\254\142\127\251\367
```

END

#

```
Trust for Certificate "beTRUSTed Root CA - Entrust Implementation"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "beTRUSTed Root CA - Entrust Implementation"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\162\231\171\023\354\233\015\256\145\321\266\327\262\112\166\243
\256\302\356\026
```

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

```
\175\206\220\217\133\361\362\100\300\367\075\142\265\244\251\073
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\146\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\063\060\061\006\003\125\004\003\023\052\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\040
\055\040\105\156\164\162\165\163\164\040\111\155\160\154\145\155
\145\156\164\141\164\151\157\156
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\004\074\265\117\100
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "beTRUSTed Root CA - RSA Implementation"

#

CKA_CLASS CK_OBJECT_CLASS

CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "beTRUSTed Root CA - RSA Implementation"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\142\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\057\060\055\006\003\125\004\003\023\046\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\040
\055\040\122\123\101\040\111\155\160\154\145\155\145\156\164\141
\164\151\157\156

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\142\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\057\060\055\006\003\125\004\003\023\046\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\040
\055\040\122\123\101\040\111\155\160\154\145\155\145\156\164\141
\164\151\157\156

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\073\131\307\173\315\133\127\236\275\067\122\254\166\264
\252\032

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\150\060\202\004\120\240\003\002\001\002\002\020\073
\131\307\173\315\133\127\236\275\067\122\254\166\264\252\032\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\142
\061\022\060\020\006\003\125\004\012\023\011\142\145\124\122\125
\123\124\145\144\061\033\060\031\006\003\125\004\013\023\022\142
\145\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101
\163\061\057\060\055\006\003\125\004\003\023\046\142\145\124\122
\125\123\124\145\144\040\122\157\157\164\040\103\101\040\055\040
\122\123\101\040\111\155\160\154\145\155\145\156\164\141\164\151

\157\156\060\036\027\015\060\062\060\064\061\061\061\061\061\070
\061\063\132\027\015\062\062\060\064\061\062\061\061\060\067\062
\065\132\060\142\061\022\060\020\006\003\125\004\012\023\011\142
\145\124\122\125\123\124\145\144\061\033\060\031\006\003\125\004
\013\023\022\142\145\124\122\125\123\124\145\144\040\122\157\157
\164\040\103\101\163\061\057\060\055\006\003\125\004\003\023\046
\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040\103
\101\040\055\040\122\123\101\040\111\155\160\154\145\155\145\156
\164\141\164\151\157\156\060\202\001\042\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202
\001\012\002\202\001\001\000\344\272\064\060\011\216\127\320\271
\006\054\157\156\044\200\042\277\135\103\246\372\117\254\202\347
\034\150\160\205\033\243\156\265\252\170\331\156\007\113\077\351
\337\365\352\350\124\241\141\212\016\057\151\165\030\267\014\345
\024\215\161\156\230\270\125\374\014\225\320\233\156\341\055\210
\324\072\100\153\222\361\231\226\144\336\333\377\170\364\356\226
\035\107\211\174\324\276\271\210\167\043\072\011\346\004\236\155
\252\136\322\310\275\232\116\031\337\211\352\133\016\176\303\344
\264\360\340\151\073\210\017\101\220\370\324\161\103\044\301\217
\046\113\073\126\351\377\214\154\067\351\105\255\205\214\123\303
\140\206\220\112\226\311\263\124\260\273\027\360\034\105\331\324
\033\031\144\126\012\031\367\314\341\377\206\257\176\130\136\254
\172\220\037\311\050\071\105\173\242\266\307\234\037\332\205\324
\041\206\131\060\223\276\123\063\067\366\357\101\317\063\307\253
\162\153\045\365\363\123\033\014\114\056\361\165\113\357\240\207
\367\376\212\025\320\154\325\313\371\150\123\271\160\025\023\302
\365\056\373\103\065\165\055\002\003\001\000\001\243\202\002\030
\060\202\002\024\060\014\006\003\125\035\023\004\005\060\003\001
\001\377\060\202\001\265\006\003\125\035\040\004\202\001\254\060
\202\001\250\060\202\001\244\006\017\053\006\001\004\001\261\076
\000\000\003\011\050\203\221\061\060\202\001\217\060\101\006\010
\053\006\001\005\005\007\002\001\026\065\150\164\164\160\072\057
\057\167\167\167\056\142\145\164\162\165\163\164\145\144\056\143
\157\155\057\160\162\157\144\165\143\164\163\137\163\145\162\166
\151\143\145\163\057\151\156\144\145\170\056\150\164\155\154\060
\202\001\110\006\010\053\006\001\005\005\007\002\002\060\202\001
\072\032\202\001\066\122\145\154\151\141\156\143\145\040\157\156
\040\157\162\040\165\163\145\040\157\146\040\164\150\151\163\040
\103\145\162\164\151\146\151\143\141\164\145\040\143\162\145\141
\164\145\163\040\141\156\040\141\143\153\156\157\167\154\145\144
\147\155\145\156\164\040\141\156\144\040\141\143\143\145\160\164
\141\156\143\145\040\157\146\040\164\150\145\040\164\150\145\156
\040\141\160\160\154\151\143\141\142\154\145\040\163\164\141\156
\144\141\162\144\040\164\145\162\155\163\040\141\156\144\040\143
\157\156\144\151\164\151\157\156\163\040\157\146\040\165\163\145
\054\040\164\150\145\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\120\162\141\143\164\151\143\145\040\123\164\141
\164\145\155\145\156\164\040\141\156\144\040\164\150\145\040\122

\145\154\171\151\156\147\040\120\141\162\164\171\040\101\147\162
\145\145\155\145\156\164\054\040\167\150\151\143\150\040\143\141
\156\040\142\145\040\146\157\165\156\144\040\141\164\040\164\150
\145\040\142\145\124\122\125\123\124\145\144\040\167\145\142\040
\163\151\164\145\054\040\150\164\164\160\072\057\057\167\167\167
\056\142\145\164\162\165\163\164\145\144\056\143\157\155\057\160
\162\157\144\165\143\164\163\137\163\145\162\166\151\143\145\163
\057\151\156\144\145\170\056\150\164\155\154\060\013\006\003\125
\035\017\004\004\003\002\001\006\060\037\006\003\125\035\043\004
\030\060\026\200\024\251\354\024\176\371\331\103\314\123\053\024
\255\317\367\360\131\211\101\315\031\060\035\006\003\125\035\016
\004\026\004\024\251\354\024\176\371\331\103\314\123\053\024\255
\317\367\360\131\211\101\315\031\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\202\001\001\000\333\227\260\165
\352\014\304\301\230\312\126\005\300\250\255\046\110\257\055\040
\350\201\307\266\337\103\301\054\035\165\113\324\102\215\347\172
\250\164\334\146\102\131\207\263\365\151\155\331\251\236\263\175
\034\061\301\365\124\342\131\044\111\345\356\275\071\246\153\212
\230\104\373\233\327\052\203\227\064\055\307\175\065\114\055\064
\270\076\015\304\354\210\047\257\236\222\375\120\141\202\250\140
\007\024\123\314\145\023\301\366\107\104\151\322\061\310\246\335
\056\263\013\336\112\215\133\075\253\015\302\065\122\242\126\067
\314\062\213\050\205\102\234\221\100\172\160\053\070\066\325\341
\163\032\037\345\372\176\137\334\326\234\073\060\352\333\300\133
\047\134\323\163\007\301\302\363\114\233\157\237\033\312\036\252
\250\070\063\011\130\262\256\374\007\350\066\334\125\272\057\117
\100\376\172\275\006\246\201\301\223\042\174\206\021\012\006\167
\110\256\065\267\057\062\232\141\136\213\276\051\237\051\044\210
\126\071\054\250\322\253\226\003\132\324\110\237\271\100\204\013
\230\150\373\001\103\326\033\342\011\261\227\034
END

#

Trust for Certificate "beTRUSTed Root CA - RSA Implementation"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "beTRUSTed Root CA - RSA Implementation"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\035\202\131\312\041\047\303\313\301\154\331\062\366\054\145\051
\214\250\207\022
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\206\102\005\011\274\247\235\354\035\363\056\016\272\330\035\320
END
CKA_ISSUER MULTILINE_OCTAL

```
\060\142\061\022\060\020\006\003\125\004\012\023\011\142\145\124
\122\125\123\124\145\144\061\033\060\031\006\003\125\004\013\023
\022\142\145\124\122\125\123\124\145\144\040\122\157\157\164\040
\103\101\163\061\057\060\055\006\003\125\004\003\023\046\142\145
\124\122\125\123\124\145\144\040\122\157\157\164\040\103\101\040
\055\040\122\123\101\040\111\155\160\154\145\155\145\156\164\141
\164\151\157\156
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\020\073\131\307\173\315\133\127\236\275\067\122\254\166\264
\252\032
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION

CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "RSA Security 2048 v3"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "RSA Security 2048 v3"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\072\061\031\060\027\006\003\125\004\012\023\020\122\123\101
\040\123\145\143\165\162\151\164\171\040\111\156\143\061\035\060
\033\006\003\125\004\013\023\024\122\123\101\040\123\145\143\165
\162\151\164\171\040\062\060\064\070\040\126\063
```

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\072\061\031\060\027\006\003\125\004\012\023\020\122\123\101
\040\123\145\143\165\162\151\164\171\040\111\156\143\061\035\060
\033\006\003\125\004\013\023\024\122\123\101\040\123\145\143\165
\162\151\164\171\040\062\060\064\070\040\126\063
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\020\012\001\001\001\000\000\002\174\000\000\000\012\000\000
\000\002
```

END

CKA_VALUE MULTILINE_OCTAL

```
\060\202\003\141\060\202\002\111\240\003\002\001\002\002\020\012
\001\001\001\000\000\002\174\000\000\000\012\000\000\000\002\060
```

\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\072
\061\031\060\027\006\003\125\004\012\023\020\122\123\101\040\123
\145\143\165\162\151\164\171\040\111\156\143\061\035\060\033\006
\003\125\004\013\023\024\122\123\101\040\123\145\143\165\162\151
\164\171\040\062\060\064\070\040\126\063\060\036\027\015\060\061
\060\062\062\062\062\060\063\071\062\063\132\027\015\062\066\060
\062\062\062\062\060\063\071\062\063\132\060\072\061\031\060\027
\006\003\125\004\012\023\020\122\123\101\040\123\145\143\165\162
\151\164\171\040\111\156\143\061\035\060\033\006\003\125\004\013
\023\024\122\123\101\040\123\145\143\165\162\151\164\171\040\062
\060\064\070\040\126\063\060\202\001\042\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202
\001\012\002\202\001\001\000\267\217\125\161\322\200\335\173\151
\171\247\360\030\120\062\074\142\147\366\012\225\007\335\346\033
\363\236\331\322\101\124\153\255\237\174\276\031\315\373\106\253
\101\150\036\030\352\125\310\057\221\170\211\050\373\047\051\140
\377\337\217\214\073\311\111\233\265\244\224\316\001\352\076\265
\143\173\177\046\375\031\335\300\041\275\204\321\055\117\106\303
\116\334\330\067\071\073\050\257\313\235\032\352\053\257\041\245
\301\043\042\270\270\033\132\023\207\127\203\321\360\040\347\350
\117\043\102\260\000\245\175\211\351\351\141\163\224\230\161\046
\274\055\152\340\367\115\360\361\266\052\070\061\201\015\051\341
\000\301\121\017\114\122\370\004\132\252\175\162\323\270\207\052
\273\143\020\003\052\263\241\117\015\132\136\106\267\075\016\365
\164\354\231\237\371\075\044\201\210\246\335\140\124\350\225\066
\075\306\011\223\232\243\022\200\000\125\231\031\107\275\320\245
\174\303\272\373\037\367\365\017\370\254\271\265\364\067\230\023
\030\336\205\133\267\014\202\073\207\157\225\071\130\060\332\156
\001\150\027\042\314\300\013\002\003\001\000\001\243\143\060\141
\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001
\377\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001
\006\060\037\006\003\125\035\043\004\030\060\026\200\024\007\303
\121\060\244\252\351\105\256\065\044\372\377\044\054\063\320\261
\235\214\060\035\006\003\125\035\016\004\026\004\024\007\303\121
\060\244\252\351\105\256\065\044\372\377\044\054\063\320\261\235
\214\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\202\001\001\000\137\076\206\166\156\270\065\074\116\066\034
\036\171\230\277\375\325\022\021\171\122\016\356\061\211\274\335
\177\371\321\306\025\041\350\212\001\124\015\072\373\124\271\326
\143\324\261\252\226\115\242\102\115\324\123\037\213\020\336\177
\145\276\140\023\047\161\210\244\163\343\204\143\321\244\125\341
\120\223\346\033\016\171\320\147\274\106\310\277\077\027\015\225
\346\306\220\151\336\347\264\057\336\225\175\320\022\077\075\076
\177\115\077\024\150\365\021\120\325\301\364\220\245\010\035\061
\140\377\140\214\043\124\012\257\376\241\156\305\321\172\052\150
\170\317\036\202\012\040\264\037\255\345\205\262\152\150\165\116
\255\045\067\224\205\276\275\241\324\352\267\014\113\074\235\350
\022\000\360\137\254\015\341\254\160\143\163\367\177\171\237\062

```
\045\102\164\005\200\050\277\275\301\044\226\130\025\261\027\041
\351\211\113\333\007\210\147\364\025\255\160\076\057\115\205\073
\302\267\333\376\230\150\043\211\341\164\017\336\364\305\204\143
\051\033\314\313\007\311\000\244\251\327\302\042\117\147\327\167
\354\040\005\141\336
END
```

```
#
```

```
Trust for Certificate "RSA Security 2048 v3"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "RSA Security 2048 v3"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\045\001\220\031\317\373\331\231\034\267\150\045\164\215\224\137
\060\223\225\102
```

```
END
```

```
CKA_CERT_MD5_HASH
```

```
MULTILINE_OCTAL
```

```
\167\015\031\261\041\375\000\102\234\076\014\245\335\013\002\216
\060\223\225\102
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\072\061\031\060\027\006\003\125\004\012\023\020\122\123\101
\040\123\145\143\165\162\151\164\171\040\111\156\143\061\035\060
\033\006\003\125\004\013\023\024\122\123\101\040\123\145\143\165
\162\151\164\171\040\062\060\064\070\040\126\063
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

```
\002\020\012\001\001\001\000\000\002\174\000\000\000\012\000\000
\000\002
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "RSA Security 1024 v3"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "RSA Security 1024 v3"
```

```
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```

```
CKA_SUBJECT
```


MULTILINE_OCTAL

\060\072\061\031\060\027\006\003\125\004\012\023\020\122\123\101
\040\123\145\143\165\162\151\164\171\040\111\156\143\061\035\060
\033\006\003\125\004\013\023\024\122\123\101\040\123\145\143\165
\162\151\164\171\040\061\060\062\064\040\126\063

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\072\061\031\060\027\006\003\125\004\012\023\020\122\123\101
\040\123\145\143\165\162\151\164\171\040\111\156\143\061\035\060
\033\006\003\125\004\013\023\024\122\123\101\040\123\145\143\165
\162\151\164\171\040\061\060\062\064\040\126\063

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\012\001\001\001\000\000\002\174\000\000\000\013\000\000
\000\002

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\134\060\202\001\305\240\003\002\001\002\002\020\012
\001\001\001\000\000\002\174\000\000\000\013\000\000\000\002\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\072
\061\031\060\027\006\003\125\004\012\023\020\122\123\101\040\123
\145\143\165\162\151\164\171\040\111\156\143\061\035\060\033\006
\003\125\004\013\023\024\122\123\101\040\123\145\143\165\162\151
\164\171\040\061\060\062\064\040\126\063\060\036\027\015\060\061
\060\062\062\062\062\061\060\061\064\071\132\027\015\062\066\060
\062\062\062\062\060\060\061\064\071\132\060\072\061\031\060\027
\006\003\125\004\012\023\020\122\123\101\040\123\145\143\165\162
\151\164\171\040\111\156\143\061\035\060\033\006\003\125\004\013
\023\024\122\123\101\040\123\145\143\165\162\151\164\171\040\061
\060\062\064\040\126\063\060\201\237\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\201\215\000\060\201\211\002
\201\201\000\325\335\376\146\011\317\044\074\076\256\201\116\116
\212\304\151\200\133\131\073\337\271\115\114\312\265\055\303\047
\055\074\257\000\102\155\274\050\246\226\317\177\327\130\254\203
\012\243\125\265\173\027\220\025\204\114\212\356\046\231\334\130
\357\307\070\246\252\257\320\216\102\310\142\327\253\254\251\373
\112\175\277\352\376\022\115\335\377\046\055\157\066\124\150\310
\322\204\126\356\222\123\141\011\263\077\071\233\250\311\233\275
\316\237\176\324\031\152\026\051\030\276\327\072\151\334\045\133
\063\032\121\002\003\001\000\001\243\143\060\141\060\017\006\003
\125\035\023\001\001\377\004\005\060\003\001\001\377\060\016\006
\003\125\035\017\001\001\377\004\004\003\002\001\006\060\037\006
\003\125\035\043\004\030\060\026\200\024\304\300\034\244\007\224
\375\315\115\001\324\124\332\245\014\137\336\256\005\132\060\035
\006\003\125\035\016\004\026\004\024\304\300\034\244\007\224\375
\315\115\001\324\124\332\245\014\137\336\256\005\132\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\201\201\000

```
\077\055\152\343\046\103\225\175\211\227\145\373\165\344\162\035
\106\127\304\141\153\151\237\022\233\054\325\132\350\300\242\360
\103\225\343\037\351\166\315\334\353\274\223\240\145\012\307\115
\117\137\247\257\242\106\024\271\014\363\314\275\152\156\267\235
\336\045\102\320\124\377\236\150\163\143\334\044\353\042\277\250
\162\362\136\000\341\015\116\072\103\156\231\116\077\211\170\003
\230\312\363\125\314\235\256\216\301\252\105\230\372\217\032\240
\215\210\043\361\025\101\015\245\106\076\221\077\213\353\367\161
END
```

```
#
```

```
Trust for Certificate "RSA Security 1024 v3"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "RSA Security 1024 v3"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\074\273\135\340\374\326\071\174\005\210\345\146\227\275\106\052
\275\371\134\166
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

```
\072\345\120\260\071\276\307\106\066\063\241\376\202\076\215\224
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\072\061\031\060\027\006\003\125\004\012\023\020\122\123\101
\040\123\145\143\165\162\151\164\171\040\111\156\143\061\035\060
\033\006\003\125\004\013\023\024\122\123\101\040\123\145\143\165
\162\151\164\171\040\061\060\062\064\040\126\063
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

```
\002\020\012\001\001\001\000\000\002\174\000\000\000\013\000\000
\000\002
```

```
END
```

```
CKA_TRUST_SERVER_AUTH
```

```
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "GeoTrust Global CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "GeoTrust Global CA"
```

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\102\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\033\060\031\006\003\125\004\003
\023\022\107\145\157\124\162\165\163\164\040\107\154\157\142\141
\154\040\103\101

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\102\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\033\060\031\006\003\125\004\003
\023\022\107\145\157\124\162\165\163\164\040\107\154\157\142\141
\154\040\103\101

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\003\002\064\126

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\124\060\202\002\074\240\003\002\001\002\002\003\002
\064\126\060\015\006\011\052\206\110\206\367\015\001\001\005\005
\000\060\102\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162
\165\163\164\040\111\156\143\056\061\033\060\031\006\003\125\004
\003\023\022\107\145\157\124\162\165\163\164\040\107\154\157\142
\141\154\040\103\101\060\036\027\015\060\062\060\065\062\061\060
\064\060\060\060\060\132\027\015\062\062\060\065\062\061\060\064
\060\060\060\060\132\060\102\061\013\060\011\006\003\125\004\006
\023\002\125\123\061\026\060\024\006\003\125\004\012\023\015\107
\145\157\124\162\165\163\164\040\111\156\143\056\061\033\060\031
\006\003\125\004\003\023\022\107\145\157\124\162\165\163\164\040
\107\154\157\142\141\154\040\103\101\060\202\001\042\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017
\000\060\202\001\012\002\202\001\001\000\332\314\030\143\060\375
\364\027\043\032\126\176\133\337\074\154\070\344\161\267\170\221
\324\274\241\330\114\370\250\103\266\003\351\115\041\007\010\210
\332\130\057\146\071\051\275\005\170\213\235\070\350\005\267\152
\176\161\244\346\304\140\246\260\357\200\344\211\050\017\236\045
\326\355\203\363\255\246\221\307\230\311\102\030\065\024\235\255
\230\106\222\056\117\312\361\207\103\301\026\225\127\055\120\357
\211\055\200\172\127\255\362\356\137\153\322\000\215\271\024\370
\024\025\065\331\300\106\243\173\162\310\221\277\311\125\053\315
\320\227\076\234\046\144\314\337\316\203\031\161\312\116\346\324
\325\173\251\031\315\125\336\310\354\322\136\070\123\345\134\117
\214\055\376\120\043\066\374\146\346\313\216\244\071\031\000\267
\225\002\071\221\013\016\376\070\056\321\035\005\232\366\115\076

\157\017\007\035\257\054\036\217\140\071\342\372\066\123\023\071
\324\136\046\053\333\075\250\024\275\062\353\030\003\050\122\004
\161\345\253\063\075\341\070\273\007\066\204\142\234\171\352\026
\060\364\137\300\053\350\161\153\344\371\002\003\001\000\001\243
\123\060\121\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\300
\172\230\150\215\211\373\253\005\144\014\021\175\252\175\145\270
\312\314\116\060\037\006\003\125\035\043\004\030\060\026\200\024
\300\172\230\150\215\211\373\253\005\144\014\021\175\252\175\145
\270\312\314\116\060\015\006\011\052\206\110\206\367\015\001\001
\005\005\000\003\202\001\001\000\065\343\051\152\345\057\135\124
\216\051\120\224\237\231\032\024\344\217\170\052\142\224\242\047
\147\236\320\317\032\136\107\351\301\262\244\317\335\101\032\005
\116\233\113\356\112\157\125\122\263\044\241\067\012\353\144\166
\052\056\054\363\375\073\165\220\277\372\161\330\307\075\067\322
\265\005\225\142\271\246\336\211\075\066\173\070\167\110\227\254
\246\040\217\056\246\311\014\302\262\231\105\000\307\316\021\121
\042\042\340\245\352\266\025\110\011\144\352\136\117\164\367\005
\076\307\212\122\014\333\025\264\275\155\233\345\306\261\124\150
\251\343\151\220\266\232\245\017\270\271\077\040\175\256\112\265
\270\234\344\035\266\253\346\224\245\301\307\203\255\333\365\047
\207\016\004\154\325\377\335\240\135\355\207\122\267\053\025\002
\256\071\246\152\164\351\332\304\347\274\115\064\036\251\134\115
\063\137\222\011\057\210\146\135\167\227\307\035\166\023\251\325
\345\361\026\011\021\065\325\254\333\044\161\160\054\230\126\013
\331\027\264\321\343\121\053\136\165\350\325\320\334\117\064\355
\302\005\146\200\241\313\346\063

END

#

Trust for Certificate "GeoTrust Global CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "GeoTrust Global CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\336\050\364\244\377\345\271\057\243\305\003\321\243\111\247\371
\226\052\202\022

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

\367\165\253\051\373\121\116\267\167\136\377\005\074\231\216\365

END

CKA_ISSUER MULTILINE_OCTAL

\060\102\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\033\060\031\006\003\125\004\003

```
\023\022\107\145\157\124\162\165\163\164\040\107\154\157\142\141
\154\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\003\002\064\126
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "GeoTrust Global CA 2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Global CA 2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT
MULTILINE_OCTAL
\060\104\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\035\060\033\006\003\125\004\003
\023\024\107\145\157\124\162\165\163\164\040\107\154\157\142\141
\154\040\103\101\040\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\104\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\035\060\033\006\003\125\004\003
\023\024\107\145\157\124\162\165\163\164\040\107\154\157\142\141
\154\040\103\101\040\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\146\060\202\002\116\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\104\061\013\060\011\006\003\125\004\006\023\002\125\123\061\026
\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165\163
\164\040\111\156\143\056\061\035\060\033\006\003\125\004\003\023
\024\107\145\157\124\162\165\163\164\040\107\154\157\142\141\154
\040\103\101\040\062\060\036\027\015\060\064\060\063\060\064\060
\065\060\060\060\060\132\027\015\061\071\060\063\060\064\060\065
```

\060\060\060\060\132\060\104\061\013\060\011\006\003\125\004\006
\023\002\125\123\061\026\060\024\006\003\125\004\012\023\015\107
\145\157\124\162\165\163\164\040\111\156\143\056\061\035\060\033
\006\003\125\004\003\023\024\107\145\157\124\162\165\163\164\040
\107\154\157\142\141\154\040\103\101\040\062\060\202\001\042\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202
\001\017\000\060\202\001\012\002\202\001\001\000\357\074\115\100
\075\020\337\073\123\000\341\147\376\224\140\025\076\205\210\361
\211\015\220\310\050\043\231\005\350\053\040\235\306\363\140\106
\330\301\262\325\214\061\331\334\040\171\044\201\277\065\062\374
\143\151\333\261\052\153\356\041\130\362\010\351\170\313\157\313
\374\026\122\310\221\304\377\075\163\336\261\076\247\302\175\146
\301\365\176\122\044\032\342\325\147\221\320\202\020\327\170\113
\117\053\102\071\275\144\055\100\240\260\020\323\070\110\106\210
\241\014\273\072\063\052\142\230\373\000\235\023\131\177\157\073
\162\252\356\246\017\206\371\005\141\352\147\177\014\067\226\213
\346\151\026\107\021\302\047\131\003\263\246\140\302\041\100\126
\372\240\307\175\072\023\343\354\127\307\263\326\256\235\211\200
\367\001\347\054\366\226\053\023\015\171\054\331\300\344\206\173
\113\214\014\162\202\212\373\027\315\000\154\072\023\074\260\204
\207\113\026\172\051\262\117\333\035\324\013\363\146\067\275\330
\366\127\273\136\044\172\270\074\213\271\372\222\032\032\204\236
\330\164\217\252\033\177\136\364\376\105\042\041\002\003\001\000
\001\243\143\060\141\060\017\006\003\125\035\023\001\001\377\004
\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004
\024\161\070\066\362\002\061\123\107\053\156\272\145\106\251\020
\025\130\040\005\011\060\037\006\003\125\035\043\004\030\060\026
\200\024\161\070\066\362\002\061\123\107\053\156\272\145\106\251
\020\025\130\040\005\011\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\206\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\001\001\000\003\367\265\053\253\135
\020\374\173\262\262\136\254\233\016\176\123\170\131\076\102\004
\376\165\243\255\254\201\116\327\002\213\136\304\055\310\122\166
\307\054\037\374\201\062\230\321\113\306\222\223\063\065\061\057
\374\330\035\104\335\340\201\177\235\351\213\341\144\221\142\013
\071\010\214\254\164\235\131\331\172\131\122\227\021\271\026\173
\157\105\323\226\331\061\175\002\066\017\234\073\156\317\054\015
\003\106\105\353\240\364\177\110\104\306\010\100\314\336\033\160
\265\051\255\272\213\073\064\145\165\033\161\041\035\054\024\012
\260\226\225\270\326\352\362\145\373\051\272\117\352\221\223\164
\151\266\362\377\341\032\320\014\321\166\205\313\212\045\275\227
\136\054\157\025\231\046\347\266\051\377\042\354\311\002\307\126
\000\315\111\271\263\154\173\123\004\032\342\250\311\252\022\005
\043\302\316\347\273\004\002\314\300\107\242\344\304\051\057\133
\105\127\211\121\356\074\353\122\010\377\007\065\036\237\065\152
\107\112\126\230\321\132\205\037\214\365\042\277\253\316\203\363
\342\042\051\256\175\203\100\250\272\154

END

```

#
Trust for Certificate "GeoTrust Global CA 2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Global CA 2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\251\351\170\010\024\067\130\210\362\005\031\260\155\053\015\053
\140\026\220\175
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\016\100\247\154\336\003\135\217\321\017\344\321\215\371\154\251
END
CKA_ISSUER MULTILINE_OCTAL
\060\104\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\035\060\033\006\003\125\004\003
\023\024\107\145\157\124\162\165\163\164\040\107\154\157\142\141
\154\040\103\101\040\062
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

```

```

#
# Certificate "GeoTrust Universal CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Universal CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\036\060\034\006\003\125\004\003
\023\025\107\145\157\124\162\165\163\164\040\125\156\151\166\145
\162\163\141\154\040\103\101
END
CKA_ID UTF8 "0"

```

CKA_ISSUER MULTILINE_OCTAL

\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\036\060\034\006\003\125\004\003
\023\025\107\145\157\124\162\165\163\164\040\125\156\151\166\145
\162\163\141\154\040\103\101

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\150\060\202\003\120\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061\026
\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165\163
\164\040\111\156\143\056\061\036\060\034\006\003\125\004\003\023
\025\107\145\157\124\162\165\163\164\040\125\156\151\166\145\162
\163\141\154\040\103\101\060\036\027\015\060\064\060\063\060\064
\060\065\060\060\060\060\132\027\015\062\071\060\063\060\064\060
\065\060\060\060\060\132\060\105\061\013\060\011\006\003\125\004
\006\023\002\125\123\061\026\060\024\006\003\125\004\012\023\015
\107\145\157\124\162\165\163\164\040\111\156\143\056\061\036\060
\034\006\003\125\004\003\023\025\107\145\157\124\162\165\163\164
\040\125\156\151\166\145\162\163\141\154\040\103\101\060\202\002
\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\202\002\017\000\060\202\002\012\002\202\002\001\000\246\025
\125\240\243\306\340\037\214\235\041\120\327\301\276\053\133\265
\244\236\241\331\162\130\275\000\033\114\277\141\311\024\035\105
\202\253\306\035\200\326\075\353\020\234\072\257\155\044\370\274
\161\001\236\006\365\174\137\036\301\016\125\312\203\232\131\060
\256\031\313\060\110\225\355\042\067\215\364\112\232\162\146\076
\255\225\300\340\026\000\340\020\037\053\061\016\327\224\124\323
\102\063\240\064\035\036\105\166\335\117\312\030\067\354\205\025
\172\031\010\374\325\307\234\360\362\251\056\020\251\222\346\075
\130\075\251\026\150\074\057\165\041\030\177\050\167\245\341\141
\027\267\246\351\370\036\231\333\163\156\364\012\242\041\154\356
\332\252\205\222\146\257\366\172\153\202\332\272\042\010\065\017
\317\102\361\065\372\152\356\176\053\045\314\072\021\344\155\257
\163\262\166\035\255\320\262\170\147\032\244\071\034\121\013\147
\126\203\375\070\135\015\316\335\360\273\053\226\037\336\173\062
\122\375\035\273\265\006\241\262\041\136\245\326\225\150\177\360
\231\236\334\105\010\076\347\322\011\015\065\224\335\200\116\123
\227\327\265\011\104\040\144\026\027\003\002\114\123\015\150\336
\325\252\162\115\223\155\202\016\333\234\275\317\264\363\134\135
\124\172\151\011\226\326\333\021\301\215\165\250\264\317\071\310
\316\074\274\044\174\346\142\312\341\275\175\247\275\127\145\013
\344\376\045\355\266\151\020\334\050\032\106\275\001\035\320\227

\265\341\230\073\300\067\144\326\075\224\356\013\341\365\050\256
\013\126\277\161\213\043\051\101\216\206\305\113\122\173\330\161
\253\037\212\025\246\073\203\132\327\130\001\121\306\114\101\331
\177\330\101\147\162\242\050\337\140\203\251\236\310\173\374\123
\163\162\131\365\223\172\027\166\016\316\367\345\134\331\013\125
\064\242\252\133\265\152\124\347\023\312\127\354\227\155\364\136
\006\057\105\213\130\324\043\026\222\344\026\156\050\143\131\060
\337\120\001\234\143\211\032\237\333\027\224\202\160\067\303\044
\236\232\107\326\132\312\116\250\151\211\162\037\221\154\333\176
\236\033\255\307\037\163\335\054\117\031\145\375\177\223\100\020
\056\322\360\355\074\236\056\050\076\151\046\063\305\173\002\003
\001\000\001\243\143\060\141\060\017\006\003\125\035\023\001\001
\377\004\005\060\003\001\001\377\060\035\006\003\125\035\016\004
\026\004\024\332\273\056\252\260\014\270\210\046\121\164\134\155
\003\323\300\330\217\172\326\060\037\006\003\125\035\043\004\030
\060\026\200\024\332\273\056\252\260\014\270\210\046\121\164\134
\155\003\323\300\330\217\172\326\060\016\006\003\125\035\017\001
\001\377\004\004\003\002\001\206\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\202\002\001\000\061\170\346\307
\265\337\270\224\100\311\161\304\250\065\354\106\035\302\205\363
\050\130\206\260\013\374\216\262\071\217\104\125\253\144\204\134
\151\251\320\232\070\074\372\345\037\065\345\104\343\200\171\224
\150\244\273\304\237\075\341\064\315\060\106\213\124\053\225\245
\357\367\077\231\204\375\065\346\317\061\306\334\152\277\247\327
\043\010\341\230\136\303\132\010\166\251\246\257\167\057\267\140
\275\104\106\152\357\227\377\163\225\301\216\350\223\373\375\061
\267\354\127\021\021\105\233\060\361\032\210\071\301\117\074\247
\000\325\307\374\253\155\200\042\160\245\014\340\135\004\051\002
\373\313\240\221\321\174\326\303\176\120\325\235\130\276\101\070
\353\271\165\074\025\331\233\311\112\203\131\300\332\123\375\063
\273\066\030\233\205\017\025\335\356\055\254\166\223\271\331\001
\215\110\020\250\373\365\070\206\361\333\012\306\275\204\243\043
\101\336\326\167\157\205\324\205\034\120\340\256\121\212\272\215
\076\166\342\271\312\047\362\137\237\357\156\131\015\006\330\053
\027\244\322\174\153\273\137\024\032\110\217\032\114\347\263\107
\034\216\114\105\053\040\356\110\337\347\335\011\216\030\250\332
\100\215\222\046\021\123\141\163\135\353\275\347\304\115\051\067
\141\353\254\071\055\147\056\026\326\365\000\203\205\241\314\177
\166\304\175\344\267\113\146\357\003\105\140\151\266\014\122\226
\222\204\136\246\243\265\244\076\053\331\314\330\033\107\252\362
\104\332\117\371\003\350\360\024\313\077\363\203\336\320\301\124
\343\267\350\012\067\115\213\040\131\003\060\031\241\054\310\275
\021\037\337\256\311\112\305\363\047\146\146\206\254\150\221\377
\331\346\123\034\017\213\134\151\145\012\046\310\036\064\303\135
\121\173\327\251\234\006\241\066\335\325\211\224\274\331\344\055
\014\136\011\154\010\227\174\243\075\174\223\377\077\241\024\247
\317\265\135\353\333\333\034\304\166\337\210\271\275\105\005\225
\033\256\374\106\152\114\257\110\343\316\256\017\322\176\353\346

```
\154\234\117\201\152\172\144\254\273\076\325\347\313\166\056\305
\247\110\301\134\220\017\313\310\077\372\346\062\341\215\033\157
\244\346\216\330\371\051\110\212\316\163\376\054
END
```

```
#
```

```
Trust for Certificate
```

```
"GeoTrust Universal CA"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "GeoTrust Universal CA"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\346\041\363\065\103\171\005\232\113\150\060\235\212\057\164\042
```

```
\025\207\354\171
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

```
\222\145\130\213\242\032\061\162\163\150\134\264\245\172\007\110
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\105\061\013\060\011\006\003\125\004\006\023\002\125\123\061
```

```
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
```

```
\163\164\040\111\156\143\056\061\036\060\034\006\003\125\004\003
```

```
\023\025\107\145\157\124\162\165\163\164\040\125\156\151\166\145
```

```
\162\163\141\154\040\103\101
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

```
\002\001\001
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_STEP_UP_APPROVED
```

```
CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "GeoTrust Universal CA 2"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "GeoTrust Universal CA 2"
```

```
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
```

```
CKA_SUBJECT MULTILINE_OCTAL
```

```
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
```

```
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
```

\163\164\040\111\156\143\056\061\040\060\036\006\003\125\004\003
\023\027\107\145\157\124\162\165\163\164\040\125\156\151\166\145
\162\163\141\154\040\103\101\040\062

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\040\060\036\006\003\125\004\003
\023\027\107\145\157\124\162\165\163\164\040\125\156\151\166\145
\162\163\141\154\040\103\101\040\062

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE

MULTILINE_OCTAL

\060\202\005\154\060\202\003\124\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061\026
\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165\163
\164\040\111\156\143\056\061\040\060\036\006\003\125\004\003\023
\027\107\145\157\124\162\165\163\164\040\125\156\151\166\145\162
\163\141\154\040\103\101\040\062\060\036\027\015\060\064\060\063
\060\064\060\065\060\060\060\060\132\027\015\062\071\060\063\060
\064\060\065\060\060\060\060\132\060\107\061\013\060\011\006\003
\125\004\006\023\002\125\123\061\026\060\024\006\003\125\004\012
\023\015\107\145\157\124\162\165\163\164\040\111\156\143\056\061
\040\060\036\006\003\125\004\003\023\027\107\145\157\124\162\165
\163\164\040\125\156\151\166\145\162\163\141\154\040\103\101\040
\062\060\202\002\042\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\202\002\017\000\060\202\002\012\002\202\002
\001\000\263\124\122\301\311\076\362\331\334\261\123\032\131\051
\347\261\303\105\050\345\327\321\355\305\305\113\241\252\164\173
\127\257\112\046\374\330\365\136\247\156\031\333\164\014\117\065
\133\062\013\001\343\333\353\172\167\065\352\252\132\340\326\350
\241\127\224\360\220\243\164\126\224\104\060\003\036\134\116\053
\205\046\164\202\172\014\166\240\157\115\316\101\055\240\025\006
\024\137\267\102\315\173\217\130\141\064\334\052\010\371\056\303
\001\246\042\104\034\114\007\202\346\133\316\320\112\174\004\323
\031\163\047\360\252\230\177\056\257\116\353\207\036\044\167\152
\135\266\350\133\105\272\334\303\241\005\157\126\216\217\020\046
\245\111\303\056\327\101\207\042\340\117\206\312\140\265\352\241
\143\300\001\227\020\171\275\000\074\022\155\053\025\261\254\113
\261\356\030\271\116\226\334\334\166\377\073\276\317\137\003\300
\374\073\350\276\106\033\377\332\100\302\122\367\376\343\072\367
\152\167\065\320\332\215\353\136\030\152\061\307\036\272\074\033
\050\326\153\124\306\252\133\327\242\054\033\031\314\242\002\366

\233\131\275\067\153\206\265\155\202\272\330\352\311\126\274\251
\066\130\375\076\031\363\355\014\046\251\223\070\370\117\301\135
\042\006\320\227\352\341\255\306\125\340\201\053\050\203\072\372
\364\173\041\121\000\276\122\070\316\315\146\171\250\364\201\126
\342\320\203\011\107\121\133\120\152\317\333\110\032\135\076\367
\313\366\145\367\154\361\225\370\002\073\062\126\202\071\172\133
\275\057\211\033\277\241\264\350\377\177\215\214\337\003\361\140
\116\130\021\114\353\243\077\020\053\203\232\001\163\331\224\155
\204\000\047\146\254\360\160\100\011\102\222\255\117\223\015\141
\011\121\044\330\222\325\013\224\141\262\207\262\355\377\232\065
\377\205\124\312\355\104\103\254\033\074\026\153\110\112\012\034
\100\210\037\222\302\013\000\005\377\362\310\002\112\244\252\251
\314\231\226\234\057\130\340\175\341\276\273\007\334\137\004\162
\134\061\064\303\354\137\055\340\075\144\220\042\346\321\354\270
\056\335\131\256\331\241\067\277\124\065\334\163\062\117\214\004
\036\063\262\311\106\361\330\134\310\125\120\311\150\275\250\272
\066\011\002\003\001\000\001\243\143\060\141\060\017\006\003\125
\035\023\001\001\377\004\005\060\003\001\001\377\060\035\006\003
\125\035\016\004\026\004\024\166\363\125\341\372\244\066\373\360
\237\134\142\161\355\074\364\107\070\020\053\060\037\006\003\125
\035\043\004\030\060\026\200\024\166\363\125\341\372\244\066\373
\360\237\134\142\161\355\074\364\107\070\020\053\060\016\006\003
\125\035\017\001\001\377\004\004\003\002\001\206\060\015\006\011
\052\206\110\206\367\015\001\001\005\005\000\003\202\002\001\000
\146\301\306\043\363\331\340\056\156\137\350\317\256\260\260\045
\115\053\370\073\130\233\100\044\067\132\313\253\026\111\377\263
\165\171\063\241\057\155\160\027\064\221\376\147\176\217\354\233
\345\136\202\251\125\037\057\334\324\121\007\022\376\254\026\076
\054\065\306\143\374\334\020\353\015\243\252\320\174\314\321\320
\057\121\056\304\024\132\336\350\031\341\076\306\314\244\051\347
\056\204\252\006\060\170\166\124\163\050\230\131\070\340\000\015
\142\323\102\175\041\237\256\075\072\214\325\372\167\015\030\053
\026\016\137\066\341\374\052\265\060\044\317\340\143\014\173\130
\032\376\231\272\102\022\261\221\364\174\150\342\310\350\257\054
\352\311\176\256\273\052\075\015\025\334\064\225\266\030\164\250
\152\017\307\264\364\023\304\344\133\355\012\322\244\227\114\052
\355\057\154\022\211\075\361\047\160\252\152\003\122\041\237\100
\250\147\120\362\363\132\037\337\337\043\366\334\170\116\346\230
\117\125\072\123\343\357\362\364\237\307\174\330\130\257\051\042
\227\270\340\275\221\056\260\166\354\127\021\317\357\051\104\363
\351\205\172\140\143\344\135\063\211\027\331\061\252\332\326\363
\030\065\162\317\207\053\057\143\043\204\135\204\214\077\127\240
\210\374\231\221\050\046\151\231\324\217\227\104\276\216\325\110
\261\244\050\051\361\025\264\341\345\236\335\370\217\246\157\046
\327\011\074\072\034\021\016\246\154\067\367\255\104\207\054\050
\307\330\164\202\263\320\157\112\127\273\065\051\047\240\213\350
\041\247\207\144\066\135\314\330\026\254\307\262\047\100\222\125
\070\050\215\121\156\335\024\147\123\154\161\134\046\204\115\165

```
\132\266\176\140\126\251\115\255\373\233\036\227\363\015\331\322
\227\124\167\332\075\022\267\340\036\357\010\006\254\371\205\207
\351\242\334\257\176\030\022\203\375\126\027\101\056\325\051\202
\175\231\364\061\366\161\251\317\054\001\047\245\005\271\252\262
\110\116\052\357\237\223\122\121\225\074\122\163\216\126\114\027
\100\300\011\050\344\213\152\110\123\333\354\315\125\125\361\306
\370\351\242\054\114\246\321\046\137\176\257\132\114\332\037\246
\362\034\054\176\256\002\026\322\126\320\057\127\123\107\350\222
END
```

```
#
```

```
Trust for Certificate "GeoTrust Universal CA 2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Universal CA 2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\067\232\031\173\101\205\105\065\014\246\003\151\363\074\056\257
\107\117\040\171
END
```

```
CKA_CERT_MD5_HASH
MULTILINE_OCTAL
\064\374\270\320\066\333\236\024\263\302\362\333\217\344\224\307
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\040\060\036\006\003\125\004\003
\023\027\107\145\157\124\162\165\163\164\040\125\156\151\166\145
\162\163\141\154\040\103\101\040\062
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "UTN-USER First-Network Applications"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN-USER First-Network
```

Applications"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\243\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\053\060\051\006\003\125
\004\003\023\042\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\116\145\164\167\157\162\153\040\101\160\160\154\151\143
\141\164\151\157\156\163

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\243\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\053\060\051\006\003\125
\004\003\023\042\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\116\145\164\167\157\162\153\040\101\160\160\154\151\143
\141\164\151\157\156\163

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\104\276\014\213\120\000\044\264\021\323\066\060\113\300
\063\167

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\144\060\202\003\114\240\003\002\001\002\002\020\104
\276\014\213\120\000\044\264\021\323\066\060\113\300\063\167\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\243\061\013\060\011\006\003\125\004\006\023\002\125\123\061\013
\060\011\006\003\125\004\010\023\002\125\124\061\027\060\025\006
\003\125\004\007\023\016\123\141\154\164\040\114\141\153\145\040
\103\151\164\171\061\036\060\034\006\003\125\004\012\023\025\124
\150\145\040\125\123\105\122\124\122\125\123\124\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\013\023\030\150
\164\164\160\072\057\057\167\167\167\056\165\163\145\162\164\162
\165\163\164\056\143\157\155\061\053\060\051\006\003\125\004\003
\023\042\125\124\116\055\125\123\105\122\106\151\162\163\164\055
\116\145\164\167\157\162\153\040\101\160\160\154\151\143\141\164

\151\157\156\163\060\036\027\015\071\071\060\067\060\071\061\070
\064\070\063\071\132\027\015\061\071\060\067\060\071\061\070\065
\067\064\071\132\060\201\243\061\013\060\011\006\003\125\004\006
\023\002\125\123\061\013\060\011\006\003\125\004\010\023\002\125
\124\061\027\060\025\006\003\125\004\007\023\016\123\141\154\164
\040\114\141\153\145\040\103\151\164\171\061\036\060\034\006\003
\125\004\012\023\025\124\150\145\040\125\123\105\122\124\122\125
\123\124\040\116\145\164\167\157\162\153\061\041\060\037\006\003
\125\004\013\023\030\150\164\164\160\072\057\057\167\167\167\056
\165\163\145\162\164\162\165\163\164\056\143\157\155\061\053\060
\051\006\003\125\004\003\023\042\125\124\116\055\125\123\105\122
\106\151\162\163\164\055\116\145\164\167\157\162\153\040\101\160
\160\154\151\143\141\164\151\157\156\163\060\202\001\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001
\017\000\060\202\001\012\002\202\001\001\000\263\373\221\241\344
\066\125\205\254\006\064\133\240\232\130\262\370\265\017\005\167
\203\256\062\261\166\222\150\354\043\112\311\166\077\343\234\266
\067\171\003\271\253\151\215\007\045\266\031\147\344\260\033\030
\163\141\112\350\176\315\323\057\144\343\246\174\014\372\027\200
\243\015\107\211\117\121\161\057\356\374\077\371\270\026\200\207
\211\223\045\040\232\103\202\151\044\166\050\131\065\241\035\300
\177\203\006\144\026\040\054\323\111\244\205\264\300\141\177\121
\010\370\150\025\221\200\313\245\325\356\073\072\364\204\004\136
\140\131\247\214\064\162\356\270\170\305\321\073\022\112\157\176
\145\047\271\244\125\305\271\157\103\244\305\035\054\231\300\122
\244\170\114\025\263\100\230\010\153\103\306\001\260\172\173\365
\153\034\042\077\313\357\377\250\320\072\113\166\025\236\322\321
\306\056\343\333\127\033\062\242\270\157\350\206\246\077\160\253
\345\160\222\253\104\036\100\120\373\234\243\142\344\154\156\240
\310\336\342\200\102\372\351\057\350\316\062\004\217\174\215\267
\034\243\065\074\025\335\236\303\256\227\245\002\003\001\000\001
\243\201\221\060\201\216\060\013\006\003\125\035\017\004\004\003
\002\001\306\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\372
\206\311\333\340\272\351\170\365\113\250\326\025\337\360\323\341
\152\024\074\060\117\006\003\125\035\037\004\110\060\106\060\104
\240\102\240\100\206\076\150\164\164\160\072\057\057\143\162\154
\056\165\163\145\162\164\162\165\163\164\056\143\157\155\057\125
\124\116\055\125\123\105\122\106\151\162\163\164\055\116\145\164
\167\157\162\153\101\160\160\154\151\143\141\164\151\157\156\163
\056\143\162\154\060\015\006\011\052\206\110\206\367\015\001\001
\005\005\000\003\202\001\001\000\244\363\045\314\321\324\221\203
\042\320\314\062\253\233\226\116\064\221\124\040\045\064\141\137
\052\002\025\341\213\252\377\175\144\121\317\012\377\274\175\330
\041\152\170\313\057\121\157\370\102\035\063\275\353\265\173\224
\303\303\251\240\055\337\321\051\037\035\376\217\077\273\250\105
\052\177\321\156\125\044\342\273\002\373\061\077\276\350\274\354
\100\053\370\001\324\126\070\344\312\104\202\265\141\040\041\147

```
\145\366\360\013\347\064\370\245\302\234\243\134\100\037\205\223
\225\006\336\117\324\047\251\266\245\374\026\315\163\061\077\270
\145\047\317\324\123\032\360\254\156\237\117\005\014\003\201\247
\204\051\304\132\275\144\127\162\255\073\317\067\030\246\230\306
\255\006\264\334\010\243\004\325\051\244\226\232\022\147\112\214
\140\105\235\361\043\232\260\000\234\150\265\230\120\323\357\216
\056\222\145\261\110\076\041\276\025\060\052\015\265\014\243\153
\077\256\177\127\365\037\226\174\337\157\335\202\060\054\145\033
\100\112\315\150\271\162\354\161\166\354\124\216\037\205\014\001
\152\372\246\070\254\037\304\204
END
```

#

```
Trust for Certificate "UTN-USER First-Network Applications"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN-USER First-Network Applications"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\135\230\234\333\025\226\021\066\121\145\144\033\126\017\333\352
\052\302\076\361
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\277\140\131\243\133\272\366\247\166\102\332\157\032\173\120\317
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\243\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\053\060\051\006\003\125
\004\003\023\042\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\116\145\164\167\157\162\153\040\101\160\160\154\151\143
\141\164\151\157\156\163
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\104\276\014\213\120\000\044\264\021\323\066\060\113\300
\063\167
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```



```

#
# Certificate "America Online Root Certification Authority 1"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "America Online Root Certification Authority
1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060
\064\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040
\117\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\061
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060
\064\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040
\117\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE
MULTILINE_OCTAL
\060\202\003\244\060\202\002\214\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061\034
\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143\141
\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060\064
\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040\117
\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\061\060\036\027\015\060\062\060\065\062\070\060\066
\060\060\060\060\132\027\015\063\067\061\061\061\071\062\060\064
\063\060\060\132\060\143\061\013\060\011\006\003\125\004\006\023
\002\125\123\061\034\060\032\006\003\125\004\012\023\023\101\155
\145\162\151\143\141\040\117\156\154\151\156\145\040\111\156\143

```

\056\061\066\060\064\006\003\125\004\003\023\055\101\155\145\162
\151\143\141\040\117\156\154\151\156\145\040\122\157\157\164\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\040\061\060\202\001\042\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017
\000\060\202\001\012\002\202\001\001\000\250\057\350\244\151\006
\003\107\303\351\052\230\377\031\242\160\232\306\120\262\176\245
\337\150\115\033\174\017\266\227\150\175\055\246\213\227\351\144
\206\311\243\357\240\206\277\140\145\234\113\124\210\302\110\305
\112\071\277\024\343\131\125\345\031\264\164\310\264\005\071\134
\026\245\342\225\005\340\022\256\131\213\242\063\150\130\034\246
\324\025\267\330\237\327\334\161\253\176\232\277\233\216\063\017
\042\375\037\056\347\007\066\357\142\071\305\335\313\272\045\024
\043\336\014\306\075\074\316\202\010\346\146\076\332\121\073\026
\072\243\005\177\240\334\207\325\234\374\162\251\240\175\170\344
\267\061\125\036\145\273\324\141\260\041\140\355\020\062\162\305
\222\045\036\370\220\112\030\170\107\337\176\060\067\076\120\033
\333\034\323\153\232\206\123\007\260\357\254\006\170\370\204\231
\376\041\215\114\200\266\014\202\366\146\160\171\032\323\117\243
\317\361\317\106\260\113\017\076\335\210\142\270\214\251\011\050
\073\172\307\227\341\036\345\364\237\300\300\256\044\240\310\241
\331\017\326\173\046\202\151\062\075\247\002\003\001\000\001\243
\143\060\141\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\000
\255\331\243\366\171\366\156\164\251\177\063\075\201\027\327\114
\317\063\336\060\037\006\003\125\035\043\004\030\060\026\200\024
\000\255\331\243\366\171\366\156\164\251\177\063\075\201\027\327
\114\317\063\336\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\206\060\015\006\011\052\206\110\206\367\015\001\001
\005\005\000\003\202\001\001\000\174\212\321\037\030\067\202\340
\270\260\243\355\126\225\310\142\141\234\005\242\315\302\142\046
\141\315\020\026\327\314\264\145\064\320\021\212\255\250\251\005
\146\357\164\363\155\137\235\231\257\366\213\373\353\122\262\005
\230\242\157\052\305\124\275\045\275\137\256\310\206\352\106\054
\301\263\275\301\351\111\160\030\026\227\010\023\214\040\340\033
\056\072\107\313\036\344\000\060\225\133\364\105\243\300\032\260
\001\116\253\275\300\043\156\143\077\200\112\305\007\355\334\342
\157\307\301\142\361\343\162\326\004\310\164\147\013\372\210\253
\241\001\310\157\360\024\257\322\231\315\121\223\176\355\056\070
\307\275\316\106\120\075\162\343\171\045\235\233\210\053\020\040
\335\245\270\062\237\215\340\051\337\041\164\206\202\333\057\202
\060\306\307\065\206\263\371\226\137\106\333\014\105\375\363\120
\303\157\306\303\110\255\106\246\341\047\107\012\035\016\233\266
\302\167\177\143\362\340\175\032\276\374\340\337\327\307\247\154
\260\371\256\272\074\375\164\264\021\350\130\015\200\274\323\250
\200\072\231\355\165\314\106\173

END

```
#
Trust for Certificate "America Online Root Certification Authority 1"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL
CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "America Online Root Certification Authority 1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\071\041\301\025\301\135\016\312\134\313\133\304\360\175\041\330
\005\013\126\152
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\024\361\010\255\235\372\144\342\211\347\034\317\250\255\175\136
END
CKA_ISSUER MULTILINE_OCTAL
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060
\064\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040
\117\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE
```

```
#
# Certificate "America Online Root Certification Authority 2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "America Online Root Certification Authority 2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060
\064\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040
\117\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164
```

```
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060
\064\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040
\117\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\062
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\244\060\202\003\214\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061\034
\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143\141
\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060\064
\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040\117
\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\040\062\060\036\027\015\060\062\060\065\062\070\060\066
\060\060\060\060\132\027\015\063\067\060\071\062\071\061\064\060
\070\060\060\132\060\143\061\013\060\011\006\003\125\004\006\023
\002\125\123\061\034\060\032\006\003\125\004\012\023\023\101\155
\145\162\151\143\141\040\117\156\154\151\156\145\040\111\156\143
\056\061\066\060\064\006\003\125\004\003\023\055\101\155\145\162
\151\143\141\040\117\156\154\151\156\145\040\122\157\157\164\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\040\062\060\202\002\042\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\002\017
\000\060\202\002\012\002\202\002\001\000\314\101\105\035\351\075
\115\020\366\214\261\101\311\340\136\313\015\267\277\107\163\323
\360\125\115\335\306\014\372\261\146\005\152\315\170\264\334\002
\333\116\201\363\327\247\174\161\274\165\143\240\135\343\007\014
\110\354\045\304\003\040\364\377\016\073\022\377\233\215\341\306
\325\033\264\155\042\343\261\333\177\041\144\257\206\274\127\042
\052\326\107\201\127\104\202\126\123\275\206\024\001\013\374\177
\164\244\132\256\361\272\021\265\233\130\132\200\264\067\170\011
\063\174\062\107\003\134\304\245\203\110\364\127\126\156\201\066
\047\030\117\354\233\050\302\324\264\327\174\014\076\014\053\337
\312\004\327\306\216\352\130\116\250\244\245\030\034\154\105\230
\243\101\321\055\322\307\155\215\031\361\255\171\267\201\077\275
```

\006\202\047\055\020\130\005\265\170\005\271\057\333\014\153\220
\220\176\024\131\070\273\224\044\023\345\321\235\024\337\323\202
\115\106\360\200\071\122\062\017\343\204\262\172\103\362\136\336
\137\077\035\335\343\262\033\240\241\052\043\003\156\056\001\025
\207\134\246\165\165\307\227\141\276\336\206\334\324\110\333\275
\052\277\112\125\332\350\175\120\373\264\200\027\270\224\277\001
\075\352\332\272\174\340\130\147\027\271\130\340\210\206\106\147
\154\235\020\107\130\062\320\065\174\171\052\220\242\132\020\021
\043\065\255\057\314\344\112\133\247\310\047\362\203\336\136\273
\136\167\347\350\245\156\143\302\015\135\141\320\214\322\154\132
\041\016\312\050\243\316\052\351\225\307\110\317\226\157\035\222
\045\310\306\306\301\301\014\005\254\046\304\322\165\322\341\052
\147\300\075\133\245\232\353\317\173\032\250\235\024\105\345\017
\240\232\145\336\057\050\275\316\157\224\146\203\110\051\330\352
\145\214\257\223\331\144\237\125\127\046\277\157\313\067\061\231
\243\140\273\034\255\211\064\062\142\270\103\041\006\162\014\241
\134\155\106\305\372\051\317\060\336\211\334\161\133\335\266\067
\076\337\120\365\270\007\045\046\345\274\265\376\074\002\263\267
\370\276\103\301\207\021\224\236\043\154\027\212\270\212\047\014
\124\107\360\251\263\300\200\214\240\047\353\035\031\343\007\216
\167\160\312\053\364\175\166\340\170\147\002\003\001\000\001\243
\143\060\141\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\115
\105\301\150\070\273\163\251\151\241\040\347\355\365\042\241\043
\024\327\236\060\037\006\003\125\035\043\004\030\060\026\200\024
\115\105\301\150\070\273\163\251\151\241\040\347\355\365\042\241
\043\024\327\236\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\206\060\015\006\011\052\206\110\206\367\015\001\001
\005\005\000\003\202\002\001\000\147\153\006\271\137\105\073\052
\113\063\263\346\033\153\131\116\042\314\271\267\244\045\311\247
\304\360\124\226\013\144\363\261\130\117\136\121\374\262\227\173
\047\145\302\345\312\347\015\014\045\173\142\343\372\237\264\207
\267\105\106\257\203\245\227\110\214\245\275\361\026\053\233\166
\054\172\065\140\154\021\200\227\314\251\222\122\346\053\346\151
\355\251\370\066\055\054\167\277\141\110\321\143\013\271\133\122
\355\030\260\103\102\042\246\261\167\256\336\151\305\315\307\034
\241\261\245\034\020\373\030\276\032\160\335\301\222\113\276\051
\132\235\077\065\276\345\175\121\370\125\340\045\165\043\207\036
\134\334\272\235\260\254\263\151\333\027\203\311\367\336\014\274
\010\334\221\236\250\320\327\025\067\163\245\065\270\374\176\305
\104\100\006\303\353\370\042\200\134\107\316\002\343\021\237\104
\377\375\232\062\314\175\144\121\016\353\127\046\166\072\343\036
\042\074\302\246\066\335\031\357\247\374\022\363\046\300\131\061
\205\114\234\330\317\337\244\314\314\051\223\377\224\155\166\134
\023\010\227\362\355\245\013\115\335\350\311\150\016\146\323\000
\016\063\022\133\274\225\345\062\220\250\263\306\154\203\255\167
\356\213\176\176\261\251\253\323\341\361\266\300\261\352\210\300
\347\323\220\351\050\222\224\173\150\173\227\052\012\147\055\205

```
\002\070\020\344\003\141\324\332\045\066\307\010\130\055\241\247
\121\257\060\012\111\365\246\151\207\007\055\104\106\166\216\052
\345\232\073\327\030\242\374\234\070\020\314\306\073\322\265\027
\072\157\375\256\045\275\365\162\131\144\261\164\052\070\137\030
\114\337\317\161\004\132\066\324\277\057\231\234\350\331\272\261
\225\346\002\113\041\241\133\325\301\117\217\256\151\155\123\333
\001\223\265\134\036\030\335\144\132\312\030\050\076\143\004\021
\375\034\215\000\017\270\067\337\147\212\235\146\251\002\152\221
\377\023\312\057\135\203\274\207\223\154\334\044\121\026\004\045
\146\372\263\331\302\272\051\276\232\110\070\202\231\364\277\073
\112\061\031\371\277\216\041\063\024\312\117\124\137\373\316\373
\217\161\177\375\136\031\240\017\113\221\270\304\124\274\006\260
\105\217\046\221\242\216\376\251
```

END

#

```
Trust for Certificate "America Online Root Certification Authority 2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "America Online Root Certification Authority 2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\205\265\377\147\233\014\171\226\037\310\156\104\042\000\106\023
\333\027\222\204
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\326\355\074\312\342\146\017\257\020\103\015\167\233\004\011\277
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\101\155\145\162\151\143
\141\040\117\156\154\151\156\145\040\111\156\143\056\061\066\060
\064\006\003\125\004\003\023\055\101\155\145\162\151\143\141\040
\117\156\154\151\156\145\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\062
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
```

END

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

#

```
# Certificate "Visa eCommerce Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Visa eCommerce Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\153\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\015\060\013\006\003\125\004\012\023\004\126\111\123\101\061\057
\060\055\006\003\125\004\013\023\046\126\151\163\141\040\111\156
\164\145\162\156\141\164\151\157\156\141\154\040\123\145\162\166
\151\143\145\040\101\163\163\157\143\151\141\164\151\157\156\061
\034\060\032\006\003\125\004\003\023\023\126\151\163\141\040\145
\103\157\155\155\145\162\143\145\040\122\157\157\164
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\153\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\015\060\013\006\003\125\004\012\023\004\126\111\123\101\061\057
\060\055\006\003\125\004\013\023\046\126\151\163\141\040\111\156
\164\145\162\156\141\164\151\157\156\141\154\040\123\145\162\166
\151\143\145\040\101\163\163\157\143\151\141\164\151\157\156\061
\034\060\032\006\003\125\004\003\023\023\126\151\163\141\040\145
\103\157\155\155\145\162\143\145\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\023\206\065\115\035\077\006\362\301\371\145\005\325\220
\034\142
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\242\060\202\002\212\240\003\002\001\002\002\020\023
\206\065\115\035\077\006\362\301\371\145\005\325\220\034\142\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\153
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\015\060
\013\006\003\125\004\012\023\004\126\111\123\101\061\057\060\055
\006\003\125\004\013\023\046\126\151\163\141\040\111\156\164\145
\162\156\141\164\151\157\156\141\154\040\123\145\162\166\151\143
\145\040\101\163\163\157\143\151\141\164\151\157\156\061\034\060
\032\006\003\125\004\003\023\023\126\151\163\141\040\145\103\157
\155\155\145\162\143\145\040\122\157\157\164\060\036\027\015\060
\062\060\066\062\066\060\062\061\070\063\066\132\027\015\062\062
\060\066\062\064\060\060\061\066\061\062\132\060\153\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\015\060\013\006\003
\125\004\012\023\004\126\111\123\101\061\057\060\055\006\003\125
\004\013\023\046\126\151\163\141\040\111\156\164\145\162\156\141
```

\164\151\157\156\141\154\040\123\145\162\166\151\143\145\040\101
\163\163\157\143\151\141\164\151\157\156\061\034\060\032\006\003
\125\004\003\023\023\126\151\163\141\040\145\103\157\155\155\145
\162\143\145\040\122\157\157\164\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\257\127\336\126\036\156\241
\332\140\261\224\047\313\027\333\007\077\200\205\117\310\234\266
\320\364\157\117\317\231\330\341\333\302\110\134\072\254\071\063
\307\037\152\213\046\075\053\065\365\110\261\221\301\002\116\004
\226\221\173\260\063\360\261\024\116\021\157\265\100\257\033\105
\245\112\357\176\266\254\362\240\037\130\077\022\106\140\074\215
\241\340\175\317\127\076\063\036\373\107\361\252\025\227\007\125
\146\245\265\055\056\330\200\131\262\247\015\267\106\354\041\143
\377\065\253\245\002\317\052\364\114\376\173\365\224\135\204\115
\250\362\140\217\333\016\045\074\237\163\161\317\224\337\112\352
\333\337\162\070\214\363\226\275\361\027\274\322\272\073\105\132
\306\247\366\306\027\213\001\235\374\031\250\052\203\026\270\072
\110\376\116\076\240\253\006\031\351\123\363\200\023\007\355\055
\277\077\012\074\125\040\071\054\054\000\151\164\225\112\274\040
\262\251\171\345\030\211\221\250\334\034\115\357\273\176\067\013
\135\376\071\245\210\122\214\000\154\354\030\174\101\275\366\213
\165\167\272\140\235\204\347\376\055\002\003\001\000\001\243\102
\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060\003
\001\001\377\060\016\006\003\125\035\017\001\001\377\004\004\003
\002\001\006\060\035\006\003\125\035\016\004\026\004\024\025\070
\203\017\077\054\077\160\063\036\315\106\376\007\214\040\340\327
\303\267\060\015\006\011\052\206\110\206\367\015\001\001\005\005
\000\003\202\001\001\000\137\361\101\175\174\134\010\271\053\340
\325\222\107\372\147\134\245\023\303\003\041\233\053\114\211\106
\317\131\115\311\376\245\100\266\143\315\335\161\050\225\147\021
\314\044\254\323\104\154\161\256\001\040\153\003\242\217\030\267
\051\072\175\345\026\140\123\170\074\300\257\025\203\367\217\122
\063\044\275\144\223\227\356\213\367\333\030\250\155\161\263\367
\054\027\320\164\045\151\367\376\153\074\224\276\115\113\101\214
\116\342\163\320\343\220\042\163\103\315\363\357\352\163\316\105
\212\260\246\111\377\114\175\235\161\210\304\166\035\220\133\035
\356\375\314\367\356\375\140\245\261\172\026\161\321\026\320\174
\022\074\154\151\227\333\256\137\071\232\160\057\005\074\031\106
\004\231\040\066\320\140\156\141\006\273\026\102\214\160\367\060
\373\340\333\146\243\000\001\275\346\054\332\221\137\240\106\213
\115\152\234\075\075\335\005\106\376\166\277\240\012\074\344\000
\346\047\267\377\204\055\336\272\042\047\226\020\161\353\042\355
\337\337\063\234\317\343\255\256\216\324\216\346\117\121\257\026
\222\340\134\366\007\017

END

#


```

Trust for Certificate "Visa eCommerce Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Visa eCommerce Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\160\027\233\206\214\000\244\372\140\221\122\042\077\237\076\062
\275\340\005\142
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\374\021\270\330\010\223\060\000\155\043\371\176\353\122\036\002
END
CKA_ISSUER
MULTILINE_OCTAL
\060\153\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\015\060\013\006\003\125\004\012\023\004\126\111\123\101\061\057
\060\055\006\003\125\004\013\023\046\126\151\163\141\040\111\156
\164\145\162\156\141\164\151\157\156\141\154\040\123\145\162\166
\151\143\145\040\101\163\163\157\143\151\141\164\151\157\156\061
\034\060\032\006\003\125\004\003\023\023\126\151\163\141\040\145
\103\157\155\155\145\162\143\145\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\023\206\065\115\035\077\006\362\301\371\145\005\325\220
\034\142
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "TC TrustCenter, Germany, Class 2 CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter, Germany, Class 2 CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157

```

\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\062\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157
\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\062\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\002\003\352

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\134\060\202\002\305\240\003\002\001\002\002\002\003
\352\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000
\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157
\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\062\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145\060
\036\027\015\071\070\060\063\060\071\061\061\065\071\065\071\132
\027\015\061\061\060\061\060\061\061\061\065\071\065\071\132\060
\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165\162
\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155\142
\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124\103

\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157\162
\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141\164
\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110\061
\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040\062
\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015\001
\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145\100
\164\162\165\163\164\143\145\156\164\145\162\056\144\145\060\201
\237\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\201\215\000\060\201\211\002\201\201\000\332\070\350\355\062
\000\051\161\203\001\015\277\214\001\334\332\306\255\071\244\251
\212\057\325\213\134\150\137\120\306\142\365\146\275\312\221\042
\354\252\035\121\327\075\263\121\262\203\116\135\313\111\260\360
\114\125\345\153\055\307\205\013\060\034\222\116\202\324\312\002
\355\367\157\276\334\340\343\024\270\005\123\362\232\364\126\213
\132\236\205\223\321\264\202\126\256\115\273\250\113\127\026\274
\376\370\130\236\370\051\215\260\173\315\170\311\117\254\213\147
\014\361\234\373\374\127\233\127\134\117\015\002\003\001\000\001
\243\153\060\151\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377\004
\004\003\002\001\206\060\063\006\011\140\206\110\001\206\370\102
\001\010\004\046\026\044\150\164\164\160\072\057\057\167\167\167
\056\164\162\165\163\164\143\145\156\164\145\162\056\144\145\057
\147\165\151\144\145\154\151\156\145\163\060\021\006\011\140\206
\110\001\206\370\102\001\001\004\004\003\002\000\007\060\015\006
\011\052\206\110\206\367\015\001\001\004\005\000\003\201\201\000
\204\122\373\050\337\377\037\165\001\274\001\276\004\126\227\152
\164\102\044\061\203\371\106\261\006\212\211\317\226\054\063\277
\214\265\137\172\162\241\205\006\316\206\370\005\216\350\371\045
\312\332\203\214\006\254\353\066\155\205\221\064\004\066\364\102
\360\370\171\056\012\110\134\253\314\121\117\170\166\240\331\254
\031\275\052\321\151\004\050\221\312\066\020\047\200\127\133\322
\134\365\302\133\253\144\201\143\164\121\364\227\277\315\022\050
\367\115\146\177\247\360\034\001\046\170\262\146\107\160\121\144
END

#

Trust for Certificate "TC TrustCenter, Germany, Class 2 CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter, Germany, Class 2 CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\203\216\060\367\177\335\024\252\070\136\321\105\000\234\016\042
\066\111\117\252
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL

\270\026\063\114\114\114\362\330\323\115\006\264\246\133\100\003

END

CKA_ISSUER MULTILINE_OCTAL

\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157
\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\062\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\002\003\352

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate

"TC TrustCenter, Germany, Class 3 CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "TC TrustCenter, Germany, Class 3 CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157
\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\063\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157
\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\063\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\002\003\353

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\134\060\202\002\305\240\003\002\001\002\002\002\003
\353\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000
\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157
\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\063\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145\060
\036\027\015\071\070\060\063\060\071\061\061\065\071\065\071\132
\027\015\061\061\060\061\060\061\061\061\065\071\065\071\132\060
\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165\162
\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155\142
\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124\103
\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157\162
\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141\164
\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110\061
\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040\063
\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015\001
\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145\100

```
\164\162\165\163\164\143\145\156\164\145\162\056\144\145\060\201
\237\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\201\215\000\060\201\211\002\201\201\000\266\264\301\065\005
\056\015\215\354\240\100\152\034\016\047\246\120\222\153\120\033
\007\336\056\347\166\314\340\332\374\204\250\136\214\143\152\053
\115\331\116\002\166\021\301\013\362\215\171\312\000\266\361\260
\016\327\373\244\027\075\257\253\151\172\226\047\277\257\063\241
\232\052\131\252\304\265\067\010\362\022\245\061\266\103\365\062
\226\161\050\050\253\215\050\206\337\273\356\343\014\175\060\326
\303\122\253\217\135\047\234\153\300\243\347\005\153\127\111\104
\263\156\352\144\317\322\216\172\120\167\167\002\003\001\000\001
\243\153\060\151\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377\004
\004\003\002\001\206\060\063\006\011\140\206\110\001\206\370\102
\001\010\004\046\026\044\150\164\164\160\072\057\057\167\167\167
\056\164\162\165\163\164\143\145\156\164\145\162\056\144\145\057
\147\165\151\144\145\154\151\156\145\163\060\021\006\011\140\206
\110\001\206\370\102\001\001\004\004\003\002\000\007\060\015\006
\011\052\206\110\206\367\015\001\001\004\005\000\003\201\201\000
\026\075\306\315\301\273\205\161\205\106\237\076\040\217\121\050
\231\354\055\105\041\143\043\133\004\273\114\220\270\210\222\004
\115\275\175\001\243\077\366\354\316\361\336\376\175\345\341\076
\273\306\253\136\013\335\075\226\304\313\251\324\371\046\346\006
\116\236\014\245\172\272\156\303\174\202\031\321\307\261\261\303
\333\015\216\233\100\174\067\013\361\135\350\375\037\220\210\245
\016\116\067\144\041\250\116\215\264\237\361\336\110\255\325\126
\030\122\051\213\107\064\022\011\324\273\222\065\357\017\333\064
END
```

#

```
Trust for Certificate "TC TrustCenter, Germany, Class 3 CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter, Germany, Class 3 CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\237\307\226\350\370\122\117\206\072\341\111\155\070\022\102\020
\137\033\170\365
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\137\224\112\163\042\270\367\321\061\354\131\071\367\216\376\156
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\274\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\020\060\016\006\003\125\004\010\023\007\110\141\155\142\165
\162\147\061\020\060\016\006\003\125\004\007\023\007\110\141\155
\142\165\162\147\061\072\060\070\006\003\125\004\012\023\061\124
```

```
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\146\157
\162\040\123\145\143\165\162\151\164\171\040\151\156\040\104\141
\164\141\040\116\145\164\167\157\162\153\163\040\107\155\142\110
\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124\162
\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163\040
\063\040\103\101\061\051\060\047\006\011\052\206\110\206\367\015
\001\011\001\026\032\143\145\162\164\151\146\151\143\141\164\145
\100\164\162\165\163\164\143\145\156\164\145\162\056\144\145
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\002\003\353
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST

CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Certum Root CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Certum Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\076\061\013\060\011\006\003\125\004\006\023\002\120\114\061
\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145\164
\157\040\123\160\056\040\172\040\157\056\157\056\061\022\060\020
\006\003\125\004\003\023\011\103\145\162\164\165\155\040\103\101
```

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\076\061\013\060\011\006\003\125\004\006\023\002\120\114\061
\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145\164
\157\040\123\160\056\040\172\040\157\056\157\056\061\022\060\020
\006\003\125\004\003\023\011\103\145\162\164\165\155\040\103\101
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\003\001\000\040
```

END

CKA_VALUE

MULTILINE_OCTAL

```
\060\202\003\014\060\202\001\364\240\003\002\001\002\002\003\001
\000\040\060\015\006\011\052\206\110\206\367\015\001\001\005\005
```

\000\060\076\061\013\060\011\006\003\125\004\006\023\002\120\114
\061\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145
\164\157\040\123\160\056\040\172\040\157\056\157\056\061\022\060
\020\006\003\125\004\003\023\011\103\145\162\164\165\155\040\103
\101\060\036\027\015\060\062\060\066\061\061\061\060\064\066\063
\071\132\027\015\062\067\060\066\061\061\061\060\064\066\063\071
\132\060\076\061\013\060\011\006\003\125\004\006\023\002\120\114
\061\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145
\164\157\040\123\160\056\040\172\040\157\056\157\056\061\022\060
\020\006\003\125\004\003\023\011\103\145\162\164\165\155\040\103
\101\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001
\001\000\316\261\301\056\323\117\174\315\045\316\030\076\117\304
\214\157\200\152\163\310\133\121\370\233\322\334\273\000\134\261
\240\374\165\003\356\201\360\210\356\043\122\351\346\025\063\215
\254\055\011\305\166\371\053\071\200\211\344\227\113\220\245\250
\170\370\163\103\173\244\141\260\330\130\314\341\154\146\176\234
\363\011\136\125\143\204\325\250\357\363\261\056\060\150\263\304
\074\330\254\156\215\231\132\220\116\064\334\066\232\217\201\210
\120\267\155\226\102\011\363\327\225\203\015\101\113\260\152\153
\370\374\017\176\142\237\147\304\355\046\137\020\046\017\010\117
\360\244\127\050\316\217\270\355\105\366\156\356\045\135\252\156
\071\276\344\223\057\331\107\240\162\353\372\246\133\257\312\123
\077\342\016\306\226\126\021\156\367\351\146\251\046\330\177\225
\123\355\012\205\210\272\117\051\245\102\214\136\266\374\205\040
\000\252\150\013\241\032\205\001\234\304\106\143\202\210\266\042
\261\356\376\252\106\131\176\317\065\054\325\266\332\135\367\110
\063\024\124\266\353\331\157\316\315\210\326\253\033\332\226\073
\035\131\002\003\001\000\001\243\023\060\021\060\017\006\003\125
\035\023\001\001\377\004\005\060\003\001\001\377\060\015\006\011
\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000
\270\215\316\357\347\024\272\317\356\260\104\222\154\264\071\076
\242\204\156\255\270\041\167\322\324\167\202\207\346\040\101\201
\356\342\370\021\267\143\321\027\067\276\031\166\044\034\004\032
\114\353\075\252\147\157\055\324\315\376\145\061\160\305\033\246
\002\012\272\140\173\155\130\302\232\111\376\143\062\013\153\343
\072\300\254\253\073\260\350\323\011\121\214\020\203\306\064\340
\305\053\340\032\266\140\024\047\154\062\167\214\274\262\162\230
\317\315\314\077\271\310\044\102\024\326\127\374\346\046\103\251
\035\345\200\220\316\003\124\050\076\367\077\323\370\115\355\152
\012\072\223\023\233\073\024\043\023\143\234\077\321\207\047\171
\345\114\121\343\001\255\205\135\032\073\261\325\163\020\244\323
\362\274\156\144\365\132\126\220\250\307\016\114\164\017\056\161
\073\367\310\107\364\151\157\025\362\021\136\203\036\234\174\122
\256\375\002\332\022\250\131\147\030\333\274\160\335\233\261\151
\355\200\316\211\100\110\152\016\065\312\051\146\025\041\224\054
\350\140\052\233\205\112\100\363\153\212\044\354\006\026\054\163
END


```

#
Trust for Certificate "Certum Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certum Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\142\122\334\100\367\021\103\242\057\336\236\367\064\216\006\102
\121\261\201\030
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\054\217\237\146\035\030\220\261\107\046\235\216\206\202\214\251
END
CKA_ISSUER MULTILINE_OCTAL
\060\076\061\013\060\011\006\003\125\004\006\023\002\120\114\061
\033\060\031\006\003\125\004\012\023\022\125\156\151\172\145\164
\157\040\123\160\056\040\172\040\157\056\157\056\061\022\060\020
\006\003\125\004\003\023\011\103\145\162\164\165\155\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\003\001\000\040
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

```

```

#
# Certificate "Comodo AAA Services root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo AAA Services root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\173\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\041\060\037\006\003
\125\004\003\014\030\101\101\101\040\103\145\162\164\151\146\151
\143\141\164\145\040\123\145\162\166\151\143\145\163

```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\173\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\041\060\037\006\003
\125\004\003\014\030\101\101\101\040\103\145\162\164\151\146\151
\143\141\164\145\040\123\145\162\166\151\143\145\163

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\062\060\202\003\032\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\173\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033
\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145\162
\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016\006
\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032\060
\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040\103
\101\040\114\151\155\151\164\145\144\061\041\060\037\006\003\125
\004\003\014\030\101\101\101\040\103\145\162\164\151\146\151\143
\141\164\145\040\123\145\162\166\151\143\145\163\060\036\027\015
\060\064\060\061\060\061\060\060\060\060\060\060\132\027\015\062
\070\061\062\063\061\062\063\065\071\065\071\132\060\173\061\013
\060\011\006\003\125\004\006\023\002\107\102\061\033\060\031\006
\003\125\004\010\014\022\107\162\145\141\164\145\162\040\115\141
\156\143\150\145\163\164\145\162\061\020\060\016\006\003\125\004
\007\014\007\123\141\154\146\157\162\144\061\032\060\030\006\003
\125\004\012\014\021\103\157\155\157\144\157\040\103\101\040\114
\151\155\151\164\145\144\061\041\060\037\006\003\125\004\003\014
\030\101\101\101\040\103\145\162\164\151\146\151\143\141\164\145
\040\123\145\162\166\151\143\145\163\060\202\001\042\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017
\000\060\202\001\012\002\202\001\001\000\276\100\235\364\156\341
\352\166\207\034\115\105\104\216\276\106\310\203\006\235\301\052
\376\030\037\216\344\002\372\363\253\135\120\212\026\061\013\232
\006\320\305\160\042\315\111\055\124\143\314\266\156\150\106\013
\123\352\313\114\044\300\274\162\116\352\361\025\256\364\124\232
\022\012\303\172\262\063\140\342\332\211\125\363\042\130\363\336
\334\317\357\203\206\242\214\224\117\237\150\362\230\220\106\204
\047\307\166\277\343\314\065\054\213\136\007\144\145\202\300\110
\260\250\221\371\141\237\166\040\120\250\221\307\146\265\353\170
\142\003\126\360\212\032\023\352\061\243\036\240\231\375\070\366

\366\047\062\130\157\007\365\153\270\373\024\053\257\267\252\314
\326\143\137\163\214\332\005\231\250\070\250\313\027\170\066\121
\254\351\236\364\170\072\215\317\017\331\102\342\230\014\253\057
\237\016\001\336\357\237\231\111\361\055\337\254\164\115\033\230
\265\107\305\345\051\321\371\220\030\307\142\234\276\203\307\046
\173\076\212\045\307\300\335\235\346\065\150\020\040\235\217\330
\336\322\303\204\234\015\136\350\057\311\002\003\001\000\001\243
\201\300\060\201\275\060\035\006\003\125\035\016\004\026\004\024
\240\021\012\043\076\226\361\007\354\342\257\051\357\202\245\177
\320\060\244\264\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\006\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\173\006\003\125\035\037\004\164\060\162
\060\070\240\066\240\064\206\062\150\164\164\160\072\057\057\143
\162\154\056\143\157\155\157\144\157\143\141\056\143\157\155\057
\101\101\101\103\145\162\164\151\146\151\143\141\164\145\123\145
\162\166\151\143\145\163\056\143\162\154\060\066\240\064\240\062
\206\060\150\164\164\160\072\057\057\143\162\154\056\143\157\155
\157\144\157\056\156\145\164\057\101\101\101\103\145\162\164\151
\146\151\143\141\164\145\123\145\162\166\151\143\145\163\056\143
\162\154\060\015\006\011\052\206\110\206\367\015\001\001\005\005
\000\003\202\001\001\000\010\126\374\002\360\233\350\377\244\372
\326\173\306\104\200\316\117\304\305\366\000\130\314\246\266\274
\024\111\150\004\166\350\346\356\135\354\002\017\140\326\215\120
\030\117\046\116\001\343\346\260\245\356\277\274\164\124\101\277
\375\374\022\270\307\117\132\364\211\140\005\177\140\267\005\112
\363\366\361\302\277\304\271\164\206\266\055\175\153\314\322\363
\106\335\057\306\340\152\303\303\064\003\054\175\226\335\132\302
\016\247\012\231\301\005\213\253\014\057\363\134\072\317\154\067
\125\011\207\336\123\100\154\130\357\374\266\253\145\156\004\366
\033\334\074\340\132\025\306\236\331\361\131\110\060\041\145\003
\154\354\351\041\163\354\233\003\241\340\067\255\240\025\030\217
\372\272\002\316\247\054\251\020\023\054\324\345\010\046\253\042
\227\140\370\220\136\164\324\242\232\123\275\362\251\150\340\242
\156\302\327\154\261\243\017\236\277\353\150\347\126\362\256\362
\343\053\070\072\011\201\265\153\205\327\276\055\355\077\032\267
\262\143\342\365\142\054\202\324\152\000\101\120\361\071\203\237
\225\351\066\226\230\156

END

#

Trust for Certificate "Comodo AAA Services root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo AAA Services root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\321\353\043\244\155\027\326\217\331\045\144\302\361\361\140\027

```

\144\330\343\111
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\111\171\004\260\353\207\031\254\107\260\274\021\121\233\164\320
END
CKA_ISSUER MULTILINE_OCTAL
\060\173\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\041\060\037\006\003
\125\004\003\014\030\101\101\101\040\103\145\162\164\151\146\151
\143\141\164\145\040\123\145\162\166\151\143\145\163
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Comodo Secure Services root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo Secure Services root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\176\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\044\060\042\006\003
\125\004\003\014\033\123\145\143\165\162\145\040\103\145\162\164
\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145\163
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\176\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145

```

\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\044\060\042\006\003
\125\004\003\014\033\123\145\143\165\162\145\040\103\145\162\164
\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145\163

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\077\060\202\003\047\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\176\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033
\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145\162
\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016\006
\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032\060
\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040\103
\101\040\114\151\155\151\164\145\144\061\044\060\042\006\003\125
\004\003\014\033\123\145\143\165\162\145\040\103\145\162\164\151
\146\151\143\141\164\145\040\123\145\162\166\151\143\145\163\060
\036\027\015\060\064\060\061\060\061\060\060\060\060\060\060\132
\027\015\062\070\061\062\063\061\062\063\065\071\065\071\132\060
\176\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033
\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145\162
\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016\006
\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032\060
\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040\103
\101\040\114\151\155\151\164\145\144\061\044\060\042\006\003\125
\004\003\014\033\123\145\143\165\162\145\040\103\145\162\164\151
\146\151\143\141\164\145\040\123\145\162\166\151\143\145\163\060
\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001
\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000
\300\161\063\202\212\320\160\353\163\207\202\100\325\035\344\313
\311\016\102\220\371\336\064\271\241\272\021\364\045\205\363\314
\162\155\362\173\227\153\263\007\361\167\044\221\137\045\217\366
\164\075\344\200\302\370\074\015\363\277\100\352\367\310\122\321
\162\157\357\310\253\101\270\156\056\027\052\225\151\014\315\322
\036\224\173\055\224\035\252\165\327\263\230\313\254\274\144\123
\100\274\217\254\254\066\313\134\255\273\335\340\224\027\354\321
\134\320\277\357\245\225\311\220\305\260\254\373\033\103\337\172
\010\135\267\270\362\100\033\053\047\236\120\316\136\145\202\210
\214\136\323\116\014\172\352\010\221\266\066\252\053\102\373\352
\302\243\071\345\333\046\070\255\213\012\356\031\143\307\034\044
\337\003\170\332\346\352\301\107\032\013\013\106\011\335\002\374
\336\313\207\137\327\060\143\150\241\256\334\062\241\272\276\376
\104\253\150\266\245\027\025\375\275\325\247\247\232\344\104\063
\351\210\216\374\355\121\353\223\161\116\255\001\347\104\216\253

\055\313\250\376\001\111\110\360\300\335\307\150\330\222\376\075
\002\003\001\000\001\243\201\307\060\201\304\060\035\006\003\125
\035\016\004\026\004\024\074\330\223\210\302\300\202\011\314\001
\231\006\223\040\351\236\160\011\143\117\060\016\006\003\125\035
\017\001\001\377\004\004\003\002\001\006\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\201\201\006\003
\125\035\037\004\172\060\170\060\073\240\071\240\067\206\065\150
\164\164\160\072\057\057\143\162\154\056\143\157\155\157\144\157
\143\141\056\143\157\155\057\123\145\143\165\162\145\103\145\162
\164\151\146\151\143\141\164\145\123\145\162\166\151\143\145\163
\056\143\162\154\060\071\240\067\240\065\206\063\150\164\164\160
\072\057\057\143\162\154\056\143\157\155\157\144\157\056\156\145
\164\057\123\145\143\165\162\145\103\145\162\164\151\146\151\143
\141\164\145\123\145\162\166\151\143\145\163\056\143\162\154\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202
\001\001\000\207\001\155\043\035\176\133\027\175\301\141\062\317
\217\347\363\212\224\131\146\340\236\050\250\136\323\267\364\064
\346\252\071\262\227\026\305\202\157\062\244\351\214\347\257\375
\357\302\350\271\113\252\243\364\346\332\215\145\041\373\272\200
\353\046\050\205\032\376\071\214\336\133\004\004\264\124\371\243
\147\236\101\372\011\122\314\005\110\250\311\077\041\004\036\316
\110\153\374\205\350\302\173\257\177\267\314\370\137\072\375\065
\306\015\357\227\334\114\253\021\341\153\313\061\321\154\373\110
\200\253\334\234\067\270\041\024\113\015\161\075\354\203\063\156
\321\156\062\026\354\230\307\026\213\131\246\064\253\005\127\055
\223\367\252\023\313\322\023\342\267\056\073\315\153\120\027\011
\150\076\265\046\127\356\266\340\266\335\271\051\200\171\175\217
\243\360\244\050\244\025\304\205\364\047\324\153\277\345\134\344
\145\002\166\124\264\343\067\146\044\323\031\141\310\122\020\345
\213\067\232\271\251\371\035\277\352\231\222\141\226\377\001\315
\241\137\015\274\161\274\016\254\013\035\107\105\035\301\354\174
\354\375\051

END

#

Trust for Certificate "Comodo Secure Services root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo Secure Services root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\112\145\325\364\035\357\071\270\270\220\112\112\323\144\201\063
\317\307\241\321
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\323\331\275\256\237\254\147\044\263\310\033\122\341\271\251\275
END

```

CKA_ISSUER MULTILINE_OCTAL
\060\176\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\044\060\042\006\003
\125\004\003\014\033\123\145\143\165\162\145\040\103\145\162\164
\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145\163
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Comodo Trusted Services root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo Trusted Services root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\045\060\043\006\003
\125\004\003\014\034\124\162\165\163\164\145\144\040\103\145\162
\164\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145
\163
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\045\060\043\006\003

```

```
\125\004\003\014\034\124\162\165\163\164\145\144\040\103\145\162
\164\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145
\163
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE
MULTILINE_OCTAL
\060\202\004\103\060\202\003\053\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\177\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033
\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145\162
\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016\006
\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032\060
\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040\103
\101\040\114\151\155\151\164\145\144\061\045\060\043\006\003\125
\004\003\014\034\124\162\165\163\164\145\144\040\103\145\162\164
\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145\163
\060\036\027\015\060\064\060\061\060\061\060\060\060\060\060\060
\132\027\015\062\070\061\062\063\061\062\063\065\071\065\071\132
\060\177\061\013\060\011\006\003\125\004\006\023\002\107\102\061
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\045\060\043\006\003
\125\004\003\014\034\124\162\165\163\164\145\144\040\103\145\162
\164\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145
\163\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001
\001\000\337\161\157\066\130\123\132\362\066\124\127\200\304\164
\010\040\355\030\177\052\035\346\065\232\036\045\254\234\345\226
\176\162\122\240\025\102\333\131\335\144\172\032\320\270\173\335
\071\025\274\125\110\304\355\072\000\352\061\021\272\362\161\164
\032\147\270\317\063\314\250\061\257\243\343\327\177\277\063\055
\114\152\074\354\213\303\222\322\123\167\044\164\234\007\156\160
\374\275\013\133\166\272\137\362\377\327\067\113\112\140\170\367
\360\372\312\160\264\352\131\252\243\316\110\057\251\303\262\013
\176\027\162\026\014\246\007\014\033\070\317\311\142\267\077\240
\223\245\207\101\362\267\160\100\167\330\276\024\174\343\250\300
\172\216\351\143\152\321\017\232\306\322\364\213\072\024\004\126
\324\355\270\314\156\365\373\342\054\130\275\177\117\153\053\367
\140\044\130\044\316\046\357\064\221\072\325\343\201\320\262\360
\004\002\327\133\267\076\222\254\153\022\212\371\344\005\260\073
\221\111\134\262\353\123\352\370\237\107\206\356\277\225\300\300
\006\237\322\133\136\021\033\364\307\004\065\051\322\125\134\344
\355\353\002\003\001\000\001\243\201\311\060\201\306\060\035\006
```



```
\003\125\035\016\004\026\004\024\305\173\130\275\355\332\045\151
\322\367\131\026\250\263\062\300\173\047\133\364\060\016\006\003
\125\035\017\001\001\377\004\004\003\002\001\006\060\017\006\003
\125\035\023\001\001\377\004\005\060\003\001\001\377\060\201\203
\006\003\125\035\037\004\174\060\172\060\074\240\072\240\070\206
\066\150\164\164\160\072\057\057\143\162\154\056\143\157\155\157
\144\157\143\141\056\143\157\155\057\124\162\165\163\164\145\144
\103\145\162\164\151\146\151\143\141\164\145\123\145\162\166\151
\143\145\163\056\143\162\154\060\072\240\070\240\066\206\064\150
\164\164\160\072\057\057\143\162\154\056\143\157\155\157\144\157
\056\156\145\164\057\124\162\165\163\164\145\144\103\145\162\164
\151\146\151\143\141\164\145\123\145\162\166\151\143\145\163\056
\143\162\154\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\003\202\001\001\000\310\223\201\073\211\264\257\270\204
\022\114\215\322\360\333\160\272\127\206\025\064\020\271\057\177
\036\260\250\211\140\241\212\302\167\014\120\112\233\000\213\330
\213\364\101\342\320\203\212\112\034\024\006\260\243\150\005\160
\061\060\247\123\233\016\351\112\240\130\151\147\016\256\235\366
\245\054\101\277\074\006\153\344\131\314\155\020\361\226\157\037
\337\364\004\002\244\237\105\076\310\330\372\066\106\104\120\077
\202\227\221\037\050\333\030\021\214\052\344\145\203\127\022\022
\214\027\077\224\066\376\135\260\300\004\167\023\270\364\025\325
\077\070\314\224\072\125\320\254\230\365\272\000\137\340\206\031
\201\170\057\050\300\176\323\314\102\012\365\256\120\240\321\076
\306\241\161\354\077\240\040\214\146\072\211\264\216\324\330\261
\115\045\107\356\057\210\310\265\341\005\105\300\276\024\161\336
\172\375\216\173\175\115\010\226\245\022\163\360\055\312\067\047
\164\022\047\114\313\266\227\351\331\256\010\155\132\071\100\335
\005\107\165\152\132\041\263\243\030\317\116\367\056\127\267\230
\160\136\310\304\170\260\142
END
```

#

```
Trust for Certificate "Comodo Trusted Services root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Comodo Trusted Services root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\341\237\343\016\213\204\140\236\200\233\027\015\162\250\305\272
\156\024\011\275
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\221\033\077\156\315\236\253\356\007\376\037\161\322\263\141\047
END
CKA_ISSUER MULTILINE_OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\107\102\061
```

```
\033\060\031\006\003\125\004\010\014\022\107\162\145\141\164\145
\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016
\006\003\125\004\007\014\007\123\141\154\146\157\162\144\061\032
\060\030\006\003\125\004\012\014\021\103\157\155\157\144\157\040
\103\101\040\114\151\155\151\164\145\144\061\045\060\043\006\003
\125\004\003\014\034\124\162\165\163\164\145\144\040\103\145\162
\164\151\146\151\143\141\164\145\040\123\145\162\166\151\143\145
\163
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "IPS Chained CAs root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IPS Chained CAs root"
CKA_CERTIFICATE_TYPE
CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\202\001\034\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\063\060\061\006\003\125\004\013\023
\052\111\120\123\040\103\101\040\103\150\141\151\156\145\144\040
\103\101\163\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\063\060\061\006
\003\125\004\003\023\052\111\120\123\040\103\101\040\103\150\141
\151\156\145\144\040\103\101\163\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\061\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026
\017\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163
END
```

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\202\001\034\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\063\060\061\006\003\125\004\013\023
\052\111\120\123\040\103\101\040\103\150\141\151\156\145\144\040
\103\101\163\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\063\060\061\006
\003\125\004\003\023\052\111\120\123\040\103\101\040\103\150\141
\151\156\145\144\040\103\101\163\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\061\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026
\017\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\007\367\060\202\007\140\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\202\001\034\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143\145
\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011\102
\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125\004
\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164\040
\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166\151
\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125\004
\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060\071
\062\071\064\065\062\061\063\060\061\006\003\125\004\013\023\052
\111\120\123\040\103\101\040\103\150\141\151\156\145\144\040\103
\101\163\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\061\063\060\061\006\003
\125\004\003\023\052\111\120\123\040\103\101\040\103\150\141\151
\156\145\144\040\103\101\163\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061
\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026\017
\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163\060
\036\027\015\060\061\061\062\062\071\060\060\065\063\065\070\132

\027\015\062\065\061\062\062\067\060\060\065\063\065\070\132\060
\202\001\034\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143\145
\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011\102
\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125\004
\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164\040
\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166\151
\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125\004
\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060\071
\062\071\064\065\062\061\063\060\061\006\003\125\004\013\023\052
\111\120\123\040\103\101\040\103\150\141\151\156\145\144\040\103
\101\163\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\061\063\060\061\006\003
\125\004\003\023\052\111\120\123\040\103\101\040\103\150\141\151
\156\145\144\040\103\101\163\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061
\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026\017
\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163\060
\201\237\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\201\215\000\060\201\211\002\201\201\000\334\126\222\111
\262\224\040\274\230\117\120\353\150\244\247\111\013\277\322\061
\350\307\117\302\206\013\372\150\375\103\132\212\363\140\222\065
\231\070\273\115\003\122\041\133\360\067\231\065\341\101\040\201
\205\201\005\161\201\235\264\225\031\251\137\166\064\056\143\067
\065\127\216\264\037\102\077\025\134\341\172\301\137\023\030\062
\061\311\255\276\243\307\203\146\036\271\234\004\023\313\151\301
\006\336\060\006\273\063\243\265\037\360\217\157\316\377\226\350
\124\276\146\200\256\153\333\101\204\066\242\075\002\003\001\000
\001\243\202\004\103\060\202\004\077\060\035\006\003\125\035\016
\004\026\004\024\241\255\061\261\371\076\341\027\246\310\253\064
\374\122\207\011\036\142\122\101\060\202\001\116\006\003\125\035
\043\004\202\001\105\060\202\001\101\200\024\241\255\061\261\371
\076\341\027\246\310\253\064\374\122\207\011\036\142\122\101\241
\202\001\044\244\202\001\040\060\202\001\034\061\013\060\011\006
\003\125\004\006\023\002\105\123\061\022\060\020\006\003\125\004
\010\023\011\102\141\162\143\145\154\157\156\141\061\022\060\020
\006\003\125\004\007\023\011\102\141\162\143\145\154\157\156\141
\061\056\060\054\006\003\125\004\012\023\045\111\120\123\040\111
\156\164\145\162\156\145\164\040\160\165\142\154\151\163\150\151
\156\147\040\123\145\162\166\151\143\145\163\040\163\056\154\056
\061\053\060\051\006\003\125\004\012\024\042\151\160\163\100\155
\141\151\154\056\151\160\163\056\145\163\040\103\056\111\056\106
\056\040\040\102\055\066\060\071\062\071\064\065\062\061\063\060
\061\006\003\125\004\013\023\052\111\120\123\040\103\101\040\103
\150\141\151\156\145\144\040\103\101\163\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\061\063\060\061\006\003\125\004\003\023\052\111\120\123

\040\103\101\040\103\150\141\151\156\145\144\040\103\101\163\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110
\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154
\056\151\160\163\056\145\163\202\001\000\060\014\006\003\125\035
\023\004\005\060\003\001\001\377\060\014\006\003\125\035\017\004
\005\003\003\007\377\200\060\153\006\003\125\035\045\004\144\060
\142\006\010\053\006\001\005\005\007\003\001\006\010\053\006\001
\005\005\007\003\002\006\010\053\006\001\005\005\007\003\003\006
\010\053\006\001\005\005\007\003\004\006\010\053\006\001\005\005
\007\003\010\006\012\053\006\001\004\001\202\067\002\001\025\006
\012\053\006\001\004\001\202\067\002\001\026\006\012\053\006\001
\004\001\202\067\012\003\001\006\012\053\006\001\004\001\202\067
\012\003\004\060\021\006\011\140\206\110\001\206\370\102\001\001
\004\004\003\002\000\007\060\032\006\003\125\035\021\004\023\060
\021\201\017\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\060\032\006\003\125\035\022\004\023\060\021\201\017\151
\160\163\100\155\141\151\154\056\151\160\163\056\145\163\060\102
\006\011\140\206\110\001\206\370\102\001\015\004\065\026\063\103
\150\141\151\156\145\144\040\103\101\040\103\145\162\164\151\146
\151\143\141\164\145\040\151\163\163\165\145\144\040\142\171\040
\150\164\164\160\072\057\057\167\167\167\056\151\160\163\056\145
\163\057\060\051\006\011\140\206\110\001\206\370\102\001\002\004
\034\026\032\150\164\164\160\072\057\057\167\167\167\056\151\160
\163\056\145\163\057\151\160\163\062\060\060\062\057\060\067\006
\011\140\206\110\001\206\370\102\001\004\004\052\026\050\150\164
\164\160\072\057\057\167\167\167\056\151\160\163\056\145\163\057
\151\160\163\062\060\060\062\057\151\160\163\062\060\060\062\103
\101\103\056\143\162\154\060\074\006\011\140\206\110\001\206\370
\102\001\003\004\057\026\055\150\164\164\160\072\057\057\167\167
\167\056\151\160\163\056\145\163\057\151\160\163\062\060\060\062
\057\162\145\166\157\143\141\164\151\157\156\103\101\103\056\150
\164\155\154\077\060\071\006\011\140\206\110\001\206\370\102\001
\007\004\054\026\052\150\164\164\160\072\057\057\167\167\167\056
\151\160\163\056\145\163\057\151\160\163\062\060\060\062\057\162
\145\156\145\167\141\154\103\101\103\056\150\164\155\154\077\060
\067\006\011\140\206\110\001\206\370\102\001\010\004\052\026\050
\150\164\164\160\072\057\057\167\167\167\056\151\160\163\056\145
\163\057\151\160\163\062\060\060\062\057\160\157\154\151\143\171
\103\101\103\056\150\164\155\154\060\155\006\003\125\035\037\004
\146\060\144\060\056\240\054\240\052\206\050\150\164\164\160\072
\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\151\160\163\062\060\060\062\103\101\103\056
\143\162\154\060\062\240\060\240\056\206\054\150\164\164\160\072
\057\057\167\167\167\142\141\143\153\056\151\160\163\056\145\163
\057\151\160\163\062\060\060\062\057\151\160\163\062\060\060\062
\103\101\103\056\143\162\154\060\057\006\010\053\006\001\005\005
\007\001\001\004\043\060\041\060\037\006\010\053\006\001\005\005

```
\007\060\001\206\023\150\164\164\160\072\057\057\157\143\163\160
\056\151\160\163\056\145\163\057\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\201\201\000\104\162\060\235\126
\130\242\101\033\050\267\225\341\246\032\225\137\247\170\100\053
\357\333\226\112\374\114\161\143\331\163\225\275\002\342\242\006
\307\276\227\052\223\200\064\206\003\372\334\330\075\036\007\315
\036\163\103\044\140\365\035\141\334\334\226\240\274\373\035\343
\347\022\000\047\063\002\300\300\053\123\075\330\153\003\201\243
\333\326\223\225\040\357\323\226\176\046\220\211\234\046\233\315
\157\146\253\355\003\042\104\070\314\131\275\237\333\366\007\242
\001\177\046\304\143\365\045\102\136\142\275
```

END

#

Trust for Certificate "IPS Chained CAs root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE

CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "IPS Chained CAs root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\310\302\137\026\236\370\120\164\325\276\350\315\242\324\074\256
\347\137\322\127
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\215\162\121\333\240\072\317\040\167\337\362\145\006\136\337\357
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\202\001\034\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\063\060\061\006\003\125\004\013\023
\052\111\120\123\040\103\101\040\103\150\141\151\156\145\144\040
\103\101\163\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\063\060\061\006
\003\125\004\003\023\052\111\120\123\040\103\101\040\103\150\141
\151\156\145\144\040\103\101\163\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\061\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026
\017\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "IPS CLASE1 root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IPS CLASE1 root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE
CKC_X_509
```

```
CKA_SUBJECT MULTILINE_OCTAL
\060\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206
\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163
```

```
END
```

```
CKA_ID
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
```

\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206
\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\007\352\060\202\007\123\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143\145
\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011\102
\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125\004
\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164\040
\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166\151
\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125\004
\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060\071
\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023\045
\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023\045
\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206\367
\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056\151
\160\163\056\145\163\060\036\027\015\060\061\061\062\062\071\060
\060\065\071\063\070\132\027\015\062\065\061\062\062\067\060\060
\065\071\063\070\132\060\202\001\022\061\013\060\011\006\003\125
\004\006\023\002\105\123\061\022\060\020\006\003\125\004\010\023
\011\102\141\162\143\145\154\157\156\141\061\022\060\020\006\003
\125\004\007\023\011\102\141\162\143\145\154\157\156\141\061\056
\060\054\006\003\125\004\012\023\045\111\120\123\040\111\156\164
\145\162\156\145\164\040\160\165\142\154\151\163\150\151\156\147
\040\123\145\162\166\151\143\145\163\040\163\056\154\056\061\053
\060\051\006\003\125\004\012\024\042\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163\040\103\056\111\056\106\056\040

\040\102\055\066\060\071\062\071\064\065\062\061\056\060\054\006
\003\125\004\013\023\045\111\120\123\040\103\101\040\103\114\101
\123\105\061\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\056\060\054\006
\003\125\004\003\023\045\111\120\123\040\103\101\040\103\114\101
\123\105\061\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\036\060\034\006
\011\052\206\110\206\367\015\001\011\001\026\017\151\160\163\100
\155\141\151\154\056\151\160\163\056\145\163\060\201\237\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201\215
\000\060\201\211\002\201\201\000\340\121\047\247\013\335\257\321
\271\103\133\202\067\105\126\162\357\232\266\302\022\357\054\022
\314\166\371\006\131\257\135\041\324\322\132\270\240\324\363\152
\375\312\151\215\146\110\367\164\346\356\066\275\350\226\221\165
\246\161\050\312\347\042\022\062\151\260\076\036\153\364\120\122
\142\142\375\143\073\175\176\354\356\070\352\142\364\154\250\161
\215\341\351\213\311\077\306\265\315\224\102\157\335\202\105\074
\350\337\011\350\357\012\125\251\126\107\141\114\111\144\163\020
\050\077\312\277\011\377\306\057\002\003\001\000\001\243\202\004
\112\060\202\004\106\060\035\006\003\125\035\016\004\026\004\024
\353\263\031\171\363\301\245\034\254\334\272\037\146\242\262\233
\151\320\170\010\060\202\001\104\006\003\125\035\043\004\202\001
\073\060\202\001\067\200\024\353\263\031\171\363\301\245\034\254
\334\272\037\146\242\262\233\151\320\170\010\241\202\001\032\244
\202\001\026\060\202\001\022\061\013\060\011\006\003\125\004\006
\023\002\105\123\061\022\060\020\006\003\125\004\010\023\011\102
\141\162\143\145\154\157\156\141\061\022\060\020\006\003\125\004
\007\023\011\102\141\162\143\145\154\157\156\141\061\056\060\054
\006\003\125\004\012\023\045\111\120\123\040\111\156\164\145\162
\156\145\164\040\160\165\142\154\151\163\150\151\156\147\040\123
\145\162\166\151\143\145\163\040\163\056\154\056\061\053\060\051
\006\003\125\004\012\024\042\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163\040\103\056\111\056\106\056\040\040\102
\055\066\060\071\062\071\064\065\062\061\056\060\054\006\003\125
\004\013\023\045\111\120\123\040\103\101\040\103\114\101\123\105
\061\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\056\060\054\006\003\125
\004\003\023\045\111\120\123\040\103\101\040\103\114\101\123\105
\061\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052
\206\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141
\151\154\056\151\160\163\056\145\163\202\001\000\060\014\006\003
\125\035\023\004\005\060\003\001\001\377\060\014\006\003\125\035
\017\004\005\003\003\007\377\200\060\153\006\003\125\035\045\004
\144\060\142\006\010\053\006\001\005\005\007\003\001\006\010\053
\006\001\005\005\007\003\002\006\010\053\006\001\005\005\007\003
\003\006\010\053\006\001\005\005\007\003\004\006\010\053\006\001
\005\005\007\003\010\006\012\053\006\001\004\001\202\067\002\001

\025\006\012\053\006\001\004\001\202\067\002\001\026\006\012\053
\006\001\004\001\202\067\012\003\001\006\012\053\006\001\004\001
\202\067\012\003\004\060\021\006\011\140\206\110\001\206\370\102
\001\001\004\004\003\002\000\007\060\032\006\003\125\035\021\004
\023\060\021\201\017\151\160\163\100\155\141\151\154\056\151\160
\163\056\145\163\060\032\006\003\125\035\022\004\023\060\021\201
\017\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163
\060\101\006\011\140\206\110\001\206\370\102\001\015\004\064\026
\062\103\114\101\123\105\061\040\103\101\040\103\145\162\164\151
\146\151\143\141\164\145\040\151\163\163\165\145\144\040\142\171
\040\150\164\164\160\072\057\057\167\167\167\056\151\160\163\056
\145\163\057\060\051\006\011\140\206\110\001\206\370\102\001\002
\004\034\026\032\150\164\164\160\072\057\057\167\167\167\056\151
\160\163\056\145\163\057\151\160\163\062\060\060\062\057\060\072
\006\011\140\206\110\001\206\370\102\001\004\004\055\026\053\150
\164\164\160\072\057\057\167\167\167\056\151\160\163\056\145\163
\057\151\160\163\062\060\060\062\057\151\160\163\062\060\060\062
\103\114\101\123\105\061\056\143\162\154\060\077\006\011\140\206
\110\001\206\370\102\001\003\004\062\026\060\150\164\164\160\072
\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\162\145\166\157\143\141\164\151\157\156\103
\114\101\123\105\061\056\150\164\155\154\077\060\074\006\011\140
\206\110\001\206\370\102\001\007\004\057\026\055\150\164\164\160
\072\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160
\163\062\060\060\062\057\162\145\156\145\167\141\154\103\114\101
\123\105\061\056\150\164\155\154\077\060\072\006\011\140\206\110
\001\206\370\102\001\010\004\055\026\053\150\164\164\160\072\057
\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163\062
\060\060\062\057\160\157\154\151\143\171\103\114\101\123\105\061
\056\150\164\155\154\060\163\006\003\125\035\037\004\154\060\152
\060\061\240\057\240\055\206\053\150\164\164\160\072\057\057\167
\167\167\056\151\160\163\056\145\163\057\151\160\163\062\060\060
\062\057\151\160\163\062\060\060\062\103\114\101\123\105\061\056
\143\162\154\060\065\240\063\240\061\206\057\150\164\164\160\072
\057\057\167\167\167\142\141\143\153\056\151\160\163\056\145\163
\057\151\160\163\062\060\060\062\057\151\160\163\062\060\060\062
\103\114\101\123\105\061\056\143\162\154\060\057\006\010\053\006
\001\005\005\007\001\001\004\043\060\041\060\037\006\010\053\006
\001\005\005\007\060\001\206\023\150\164\164\160\072\057\057\157
\143\163\160\056\151\160\163\056\145\163\057\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\003\201\201\000\053\320
\353\375\332\310\312\131\152\332\323\314\062\056\311\124\033\212
\142\176\025\055\351\331\061\323\056\364\047\043\377\133\253\305
\112\266\162\100\256\123\164\364\274\005\264\306\331\310\311\167
\373\267\371\064\177\170\000\370\326\244\344\122\077\054\112\143
\127\201\165\132\216\350\214\373\002\300\224\306\051\272\263\334
\034\350\262\257\322\056\142\133\032\251\216\016\314\305\127\105
\121\024\351\116\034\210\245\221\364\243\367\216\121\310\251\276

\206\063\076\346\057\110\156\257\124\220\116\255\261\045

END

#

Trust for Certificate "IPS CLASE1 root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "IPS CLASE1 root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\103\236\122\137\132\152\107\303\054\353\304\134\143\355\071\061
\174\345\364\337

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

\204\220\035\225\060\111\126\374\101\201\360\105\327\166\304\153

END

CKA_ISSUER MULTILINE_OCTAL

\060\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\061\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206
\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

```
# Certificate "IPS CLASE3 root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IPS CLASE3 root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206
\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163
END
CKA_ID
UTF8 "0"
CKA_ISSUER
MULTILINE_OCTAL
\060\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206
```

\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\000
END
CKA_VALUE MULTILINE_OCTAL
\060\202\007\352\060\202\007\123\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143\145
\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011\102
\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125\004
\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164\040
\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166\151
\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125\004
\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060\071
\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023\045
\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023\045
\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206\367
\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056\151
\160\163\056\145\163\060\036\027\015\060\061\061\062\062\071\060
\061\060\061\064\064\132\027\015\062\065\061\062\062\067\060\061
\060\061\064\064\132\060\202\001\022\061\013\060\011\006\003\125
\004\006\023\002\105\123\061\022\060\020\006\003\125\004\010\023
\011\102\141\162\143\145\154\157\156\141\061\022\060\020\006\003
\125\004\007\023\011\102\141\162\143\145\154\157\156\141\061\056
\060\054\006\003\125\004\012\023\045\111\120\123\040\111\156\164
\145\162\156\145\164\040\160\165\142\154\151\163\150\151\156\147
\040\123\145\162\166\151\143\145\163\040\163\056\154\056\061\053
\060\051\006\003\125\004\012\024\042\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163\040\103\056\111\056\106\056\040
\040\102\055\066\060\071\062\071\064\065\062\061\056\060\054\006
\003\125\004\013\023\045\111\120\123\040\103\101\040\103\114\101
\123\105\063\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\056\060\054\006
\003\125\004\003\023\045\111\120\123\040\103\101\040\103\114\101
\123\105\063\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\036\060\034\006
\011\052\206\110\206\367\015\001\011\001\026\017\151\160\163\100
\155\141\151\154\056\151\160\163\056\145\163\060\201\237\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201\215

\000\060\201\211\002\201\201\000\253\027\376\016\260\306\150\033
\123\360\122\276\237\372\332\372\213\023\004\273\001\217\062\331
\037\217\115\316\066\230\332\344\000\104\214\050\330\023\104\052
\244\153\116\027\044\102\234\323\210\244\101\202\326\043\373\213
\311\206\345\271\251\202\005\334\361\336\037\340\014\231\125\230
\362\070\354\154\235\040\003\300\357\252\243\306\144\004\121\055
\170\015\243\322\250\072\326\044\114\351\226\172\030\254\023\043
\042\033\174\350\061\021\263\137\011\252\060\160\161\106\045\153
\111\161\200\053\225\001\262\037\002\003\001\000\001\243\202\004
\112\060\202\004\106\060\035\006\003\125\035\016\004\026\004\024
\270\223\377\056\313\334\054\216\242\347\172\376\066\121\041\243
\230\133\014\064\060\202\001\104\006\003\125\035\043\004\202\001
\073\060\202\001\067\200\024\270\223\377\056\313\334\054\216\242
\347\172\376\066\121\041\243\230\133\014\064\241\202\001\032\244
\202\001\026\060\202\001\022\061\013\060\011\006\003\125\004\006
\023\002\105\123\061\022\060\020\006\003\125\004\010\023\011\102
\141\162\143\145\154\157\156\141\061\022\060\020\006\003\125\004
\007\023\011\102\141\162\143\145\154\157\156\141\061\056\060\054
\006\003\125\004\012\023\045\111\120\123\040\111\156\164\145\162
\156\145\164\040\160\165\142\154\151\163\150\151\156\147\040\123
\145\162\166\151\143\145\163\040\163\056\154\056\061\053\060\051
\006\003\125\004\012\024\042\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163\040\103\056\111\056\106\056\040\040\102
\055\066\060\071\062\071\064\065\062\061\056\060\054\006\003\125
\004\013\023\045\111\120\123\040\103\101\040\103\114\101\123\105
\063\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\056\060\054\006\003\125
\004\003\023\045\111\120\123\040\103\101\040\103\114\101\123\105
\063\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052
\206\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141
\151\154\056\151\160\163\056\145\163\202\001\000\060\014\006\003
\125\035\023\004\005\060\003\001\001\377\060\014\006\003\125\035
\017\004\005\003\003\007\377\200\060\153\006\003\125\035\045\004
\144\060\142\006\010\053\006\001\005\005\007\003\001\006\010\053
\006\001\005\005\007\003\002\006\010\053\006\001\005\005\007\003
\003\006\010\053\006\001\005\005\007\003\004\006\010\053\006\001
\005\005\007\003\010\006\012\053\006\001\004\001\202\067\002\001
\025\006\012\053\006\001\004\001\202\067\002\001\026\006\012\053
\006\001\004\001\202\067\012\003\001\006\012\053\006\001\004\001
\202\067\012\003\004\060\021\006\011\140\206\110\001\206\370\102
\001\001\004\004\003\002\000\007\060\032\006\003\125\035\021\004
\023\060\021\201\017\151\160\163\100\155\141\151\154\056\151\160
\163\056\145\163\060\032\006\003\125\035\022\004\023\060\021\201
\017\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163
\060\101\006\011\140\206\110\001\206\370\102\001\015\004\064\026
\062\103\114\101\123\105\063\040\103\101\040\103\145\162\164\151
\146\151\143\141\164\145\040\151\163\163\165\145\144\040\142\171

\040\150\164\164\160\072\057\057\167\167\167\056\151\160\163\056
\145\163\057\060\051\006\011\140\206\110\001\206\370\102\001\002
\004\034\026\032\150\164\164\160\072\057\057\167\167\167\056\151
\160\163\056\145\163\057\151\160\163\062\060\060\062\057\060\072
\006\011\140\206\110\001\206\370\102\001\004\004\055\026\053\150
\164\164\160\072\057\057\167\167\167\056\151\160\163\056\145\163
\057\151\160\163\062\060\060\062\057\151\160\163\062\060\060\062
\103\114\101\123\105\063\056\143\162\154\060\077\006\011\140\206
\110\001\206\370\102\001\003\004\062\026\060\150\164\164\160\072
\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\162\145\166\157\143\141\164\151\157\156\103
\114\101\123\105\063\056\150\164\155\154\077\060\074\006\011\140
\206\110\001\206\370\102\001\007\004\057\026\055\150\164\164\160
\072\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160
\163\062\060\060\062\057\162\145\156\145\167\141\154\103\114\101
\123\105\063\056\150\164\155\154\077\060\072\006\011\140\206\110
\001\206\370\102\001\010\004\055\026\053\150\164\164\160\072\057
\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163\062
\060\060\062\057\160\157\154\151\143\171\103\114\101\123\105\063
\056\150\164\155\154\060\163\006\003\125\035\037\004\154\060\152
\060\061\240\057\240\055\206\053\150\164\164\160\072\057\057\167
\167\167\056\151\160\163\056\145\163\057\151\160\163\062\060\060
\062\057\151\160\163\062\060\060\062\103\114\101\123\105\063\056
\143\162\154\060\065\240\063\240\061\206\057\150\164\164\160\072
\057\057\167\167\167\142\141\143\153\056\151\160\163\056\145\163
\057\151\160\163\062\060\060\062\057\151\160\163\062\060\060\062
\103\114\101\123\105\063\056\143\162\154\060\057\006\010\053\006
\001\005\005\007\001\001\004\043\060\041\060\037\006\010\053\006
\001\005\005\007\060\001\206\023\150\164\164\160\072\057\057\157
\143\163\160\056\151\160\163\056\145\163\057\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\003\201\201\000\027\145
\134\231\225\103\003\047\257\046\345\353\320\263\027\043\367\103
\252\307\360\175\354\017\306\251\256\256\226\017\166\051\034\342
\006\055\176\046\305\074\372\241\301\201\316\123\260\102\321\227
\127\032\027\176\244\121\141\306\356\351\136\357\005\272\353\275
\017\247\222\157\330\243\006\150\051\216\171\365\377\277\371\247
\257\344\261\316\302\321\200\102\047\005\004\064\370\303\177\026
\170\043\014\007\044\362\106\107\255\073\124\320\257\325\061\262
\257\175\310\352\351\324\126\331\016\023\262\305\105\120
END

#

Trust for Certificate "IPS CLASE3 root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "IPS CLASE3 root"

```

CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\101\170\253\114\277\316\173\101\002\254\332\304\223\076\157\365
\015\317\161\134
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\102\166\227\150\317\246\264\070\044\252\241\033\362\147\336\312
END
CKA_ISSUER MULTILINE_OCTAL
\060\202\001\022\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\056\060\054\006\003\125\004\013\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\056\060\054\006\003\125\004\003\023
\045\111\120\123\040\103\101\040\103\114\101\123\105\063\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110\206
\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "IPS CLASEA1 root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IPS CLASEA1 root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143

```


\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\061\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003
\023\046\111\120\123\040\103\101\040\103\114\101\123\105\101\061
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206
\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\061\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003
\023\046\111\120\123\040\103\101\040\103\114\101\123\105\101\061
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206
\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE

MULTILINE_OCTAL

\060\202\007\367\060\202\007\140\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105\123

\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143\145
\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011\102
\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125\004
\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164\040
\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166\151
\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125\004
\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060\071
\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023\046
\111\120\123\040\103\101\040\103\114\101\123\105\101\061\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\061\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110
\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154
\056\151\160\163\056\145\163\060\036\027\015\060\061\061\062\062
\071\060\061\060\065\063\062\132\027\015\062\065\061\062\062\067
\060\061\060\065\063\062\132\060\202\001\024\061\013\060\011\006
\003\125\004\006\023\002\105\123\061\022\060\020\006\003\125\004
\010\023\011\102\141\162\143\145\154\157\156\141\061\022\060\020
\006\003\125\004\007\023\011\102\141\162\143\145\154\157\156\141
\061\056\060\054\006\003\125\004\012\023\045\111\120\123\040\111
\156\164\145\162\156\145\164\040\160\165\142\154\151\163\150\151
\156\147\040\123\145\162\166\151\143\145\163\040\163\056\154\056
\061\053\060\051\006\003\125\004\012\024\042\151\160\163\100\155
\141\151\154\056\151\160\163\056\145\163\040\103\056\111\056\106
\056\040\040\102\055\066\060\071\062\071\064\065\062\061\057\060
\055\006\003\125\004\013\023\046\111\120\123\040\103\101\040\103
\114\101\123\105\101\061\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\057
\060\055\006\003\125\004\003\023\046\111\120\123\040\103\101\040
\103\114\101\123\105\101\061\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061
\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026\017
\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163\060
\201\237\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\201\215\000\060\201\211\002\201\201\000\273\060\327\334
\320\124\275\065\116\237\305\114\202\352\321\120\074\107\230\374
\233\151\235\167\315\156\340\077\356\353\062\137\137\237\322\320
\171\345\225\163\104\041\062\340\012\333\235\327\316\215\253\122
\213\053\170\340\233\133\175\364\375\155\011\345\256\341\154\035
\007\043\240\027\321\371\175\250\106\106\221\042\250\262\151\306
\255\367\365\365\224\241\060\224\275\000\314\104\177\356\304\236
\311\301\346\217\012\066\301\375\044\075\001\240\365\173\342\174
\170\146\103\213\117\131\362\233\331\372\111\263\002\003\001\000
\001\243\202\004\123\060\202\004\117\060\035\006\003\125\035\016
\004\026\004\024\147\046\226\347\241\277\330\265\003\235\376\073

\334\376\362\212\346\025\335\060\060\202\001\106\006\003\125\035
\043\004\202\001\075\060\202\001\071\200\024\147\046\226\347\241
\277\330\265\003\235\376\073\334\376\362\212\346\025\335\060\241
\202\001\034\244\202\001\030\060\202\001\024\061\013\060\011\006
\003\125\004\006\023\002\105\123\061\022\060\020\006\003\125\004
\010\023\011\102\141\162\143\145\154\157\156\141\061\022\060\020
\006\003\125\004\007\023\011\102\141\162\143\145\154\157\156\141
\061\056\060\054\006\003\125\004\012\023\045\111\120\123\040\111
\156\164\145\162\156\145\164\040\160\165\142\154\151\163\150\151
\156\147\040\123\145\162\166\151\143\145\163\040\163\056\154\056
\061\053\060\051\006\003\125\004\012\024\042\151\160\163\100\155
\141\151\154\056\151\160\163\056\145\163\040\103\056\111\056\106
\056\040\040\102\055\066\060\071\062\071\064\065\062\061\057\060
\055\006\003\125\004\013\023\046\111\120\123\040\103\101\040\103
\114\101\123\105\101\061\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\057
\060\055\006\003\125\004\003\023\046\111\120\123\040\103\101\040
\103\114\101\123\105\101\061\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061
\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026\017
\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163\202
\001\000\060\014\006\003\125\035\023\004\005\060\003\001\001\377
\060\014\006\003\125\035\017\004\005\003\003\007\377\200\060\153
\006\003\125\035\045\004\144\060\142\006\010\053\006\001\005\005
\007\003\001\006\010\053\006\001\005\005\007\003\002\006\010\053
\006\001\005\005\007\003\003\006\010\053\006\001\005\005\007\003
\004\006\010\053\006\001\005\005\007\003\010\006\012\053\006\001
\004\001\202\067\002\001\025\006\012\053\006\001\004\001\202\067
\002\001\026\006\012\053\006\001\004\001\202\067\012\003\001\006
\012\053\006\001\004\001\202\067\012\003\004\060\021\006\011\140
\206\110\001\206\370\102\001\001\004\004\003\002\000\007\060\032
\006\003\125\035\021\004\023\060\021\201\017\151\160\163\100\155
\141\151\154\056\151\160\163\056\145\163\060\032\006\003\125\035
\022\004\023\060\021\201\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163\060\102\006\011\140\206\110\001\206\370
\102\001\015\004\065\026\063\103\114\101\123\105\101\061\040\103
\101\040\103\145\162\164\151\146\151\143\141\164\145\040\151\163
\163\165\145\144\040\142\171\040\150\164\164\160\072\057\057\167
\167\167\056\151\160\163\056\145\163\057\060\051\006\011\140\206
\110\001\206\370\102\001\002\004\034\026\032\150\164\164\160\072
\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\060\073\006\011\140\206\110\001\206\370\102
\001\004\004\056\026\054\150\164\164\160\072\057\057\167\167\167
\056\151\160\163\056\145\163\057\151\160\163\062\060\060\062\057
\151\160\163\062\060\060\062\103\114\101\123\105\101\061\056\143
\162\154\060\100\006\011\140\206\110\001\206\370\102\001\003\004
\063\026\061\150\164\164\160\072\057\057\167\167\167\056\151\160
\163\056\145\163\057\151\160\163\062\060\060\062\057\162\145\166

```
\157\143\141\164\151\157\156\103\114\101\123\105\101\061\056\150
\164\155\154\077\060\075\006\011\140\206\110\001\206\370\102\001
\007\004\060\026\056\150\164\164\160\072\057\057\167\167\167\056
\151\160\163\056\145\163\057\151\160\163\062\060\060\062\057\162
\145\156\145\167\141\154\103\114\101\123\105\101\061\056\150\164
\155\154\077\060\073\006\011\140\206\110\001\206\370\102\001\010
\004\056\026\054\150\164\164\160\072\057\057\167\167\167\056\151
\160\163\056\145\163\057\151\160\163\062\060\060\062\057\160\157
\154\151\143\171\103\114\101\123\105\101\061\056\150\164\155\154
\060\165\006\003\125\035\037\004\156\060\154\060\062\240\060\240
\056\206\054\150\164\164\160\072\057\057\167\167\167\056\151\160
\163\056\145\163\057\151\160\163\062\060\060\062\057\151\160\163
\062\060\060\062\103\114\101\123\105\101\061\056\143\162\154\060
\066\240\064\240\062\206\060\150\164\164\160\072\057\057\167\167
\167\142\141\143\153\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\151\160\163\062\060\060\062\103\114\101\123
\105\101\061\056\143\162\154\060\057\006\010\053\006\001\005\005
\007\001\001\004\043\060\041\060\037\006\010\053\006\001\005\005
\007\060\001\206\023\150\164\164\160\072\057\057\157\143\163\160
\056\151\160\163\056\145\163\057\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\201\201\000\176\272\212\254\200
\000\204\025\012\325\230\121\014\144\305\234\002\130\203\146\312
\255\036\007\315\176\152\332\200\007\337\003\064\112\034\223\304
\113\130\040\065\066\161\355\242\012\065\022\245\246\145\247\205
\151\012\016\343\141\356\352\276\050\223\063\325\354\350\276\304
\333\137\177\250\371\143\061\310\153\226\342\051\302\133\240\347
\227\066\235\167\136\061\153\376\323\247\333\052\333\333\226\213
\037\146\336\266\003\300\053\263\170\326\125\007\345\217\071\120
\336\007\043\162\346\275\040\024\113\264\206
```

END

#

Trust for Certificate "IPS CLASEA1 root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "IPS CLASEA1 root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\063\243\065\302\074\350\003\113\004\341\075\345\304\216\171\032
\353\214\062\004
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\014\370\236\027\374\324\003\275\346\215\233\074\005\207\376\204
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
```

```
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\061\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003
\023\046\111\120\123\040\103\101\040\103\114\101\123\105\101\061
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206
\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\000
```

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "IPS CLASEA3 root"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "IPS CLASEA3 root"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\063\040
```

\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003
\023\046\111\120\123\040\103\101\040\103\114\101\123\105\101\063
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206
\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\063\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003
\023\046\111\120\123\040\103\101\040\103\114\101\123\105\101\063
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206
\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\007\367\060\202\007\140\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143\145
\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011\102
\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125\004
\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164\040
\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166\151
\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125\004
\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060\071
\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023\046
\111\120\123\040\103\101\040\103\114\101\123\105\101\063\040\103

\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\063\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206\110
\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151\154
\056\151\160\163\056\145\163\060\036\027\015\060\061\061\062\062
\071\060\061\060\067\065\060\132\027\015\062\065\061\062\062\067
\060\061\060\067\065\060\132\060\202\001\024\061\013\060\011\006
\003\125\004\006\023\002\105\123\061\022\060\020\006\003\125\004
\010\023\011\102\141\162\143\145\154\157\156\141\061\022\060\020
\006\003\125\004\007\023\011\102\141\162\143\145\154\157\156\141
\061\056\060\054\006\003\125\004\012\023\045\111\120\123\040\111
\156\164\145\162\156\145\164\040\160\165\142\154\151\163\150\151
\156\147\040\123\145\162\166\151\143\145\163\040\163\056\154\056
\061\053\060\051\006\003\125\004\012\024\042\151\160\163\100\155
\141\151\154\056\151\160\163\056\145\163\040\103\056\111\056\106
\056\040\040\102\055\066\060\071\062\071\064\065\062\061\057\060
\055\006\003\125\004\013\023\046\111\120\123\040\103\101\040\103
\114\101\123\105\101\063\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\057
\060\055\006\003\125\004\003\023\046\111\120\123\040\103\101\040
\103\114\101\123\105\101\063\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061
\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026\017
\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163\060
\201\237\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\201\215\000\060\201\211\002\201\201\000\356\200\000\366
\032\144\056\255\152\310\203\261\213\247\356\217\331\266\333\315
\033\273\206\006\042\166\063\014\022\155\110\126\141\322\334\202
\045\142\057\237\322\151\060\145\003\102\043\130\274\107\334\153
\326\165\135\027\074\341\377\362\130\147\171\240\301\201\261\324
\126\242\362\215\021\231\375\366\175\361\307\304\136\002\052\232
\342\112\265\023\212\000\375\214\167\206\346\327\224\365\040\165
\056\016\114\277\164\304\077\201\076\203\264\243\070\066\051\347
\350\052\365\214\210\101\252\200\246\343\154\357\002\003\001\000
\001\243\202\004\123\060\202\004\117\060\035\006\003\125\035\016
\004\026\004\024\036\237\127\120\107\266\141\223\071\323\054\374
\332\135\075\005\165\267\231\002\060\202\001\106\006\003\125\035
\043\004\202\001\075\060\202\001\071\200\024\036\237\127\120\107
\266\141\223\071\323\054\374\332\135\075\005\165\267\231\002\241
\202\001\034\244\202\001\030\060\202\001\024\061\013\060\011\006
\003\125\004\006\023\002\105\123\061\022\060\020\006\003\125\004
\010\023\011\102\141\162\143\145\154\157\156\141\061\022\060\020
\006\003\125\004\007\023\011\102\141\162\143\145\154\157\156\141
\061\056\060\054\006\003\125\004\012\023\045\111\120\123\040\111
\156\164\145\162\156\145\164\040\160\165\142\154\151\163\150\151
\156\147\040\123\145\162\166\151\143\145\163\040\163\056\154\056

\061\053\060\051\006\003\125\004\012\024\042\151\160\163\100\155
\141\151\154\056\151\160\163\056\145\163\040\103\056\111\056\106
\056\040\040\102\055\066\060\071\062\071\064\065\062\061\057\060
\055\006\003\125\004\013\023\046\111\120\123\040\103\101\040\103
\114\101\123\105\101\063\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061\057
\060\055\006\003\125\004\003\023\046\111\120\123\040\103\101\040
\103\114\101\123\105\101\063\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\061
\036\060\034\006\011\052\206\110\206\367\015\001\011\001\026\017
\151\160\163\100\155\141\151\154\056\151\160\163\056\145\163\202
\001\000\060\014\006\003\125\035\023\004\005\060\003\001\001\377
\060\014\006\003\125\035\017\004\005\003\003\007\377\200\060\153
\006\003\125\035\045\004\144\060\142\006\010\053\006\001\005\005
\007\003\001\006\010\053\006\001\005\005\007\003\002\006\010\053
\006\001\005\005\007\003\003\006\010\053\006\001\005\005\007\003
\004\006\010\053\006\001\005\005\007\003\010\006\012\053\006\001
\004\001\202\067\002\001\025\006\012\053\006\001\004\001\202\067
\002\001\026\006\012\053\006\001\004\001\202\067\012\003\001\006
\012\053\006\001\004\001\202\067\012\003\004\060\021\006\011\140
\206\110\001\206\370\102\001\001\004\004\003\002\000\007\060\032
\006\003\125\035\021\004\023\060\021\201\017\151\160\163\100\155
\141\151\154\056\151\160\163\056\145\163\060\032\006\003\125\035
\022\004\023\060\021\201\017\151\160\163\100\155\141\151\154\056
\151\160\163\056\145\163\060\102\006\011\140\206\110\001\206\370
\102\001\015\004\065\026\063\103\114\101\123\105\101\063\040\103
\101\040\103\145\162\164\151\146\151\143\141\164\145\040\151\163
\163\165\145\144\040\142\171\040\150\164\164\160\072\057\057\167
\167\167\056\151\160\163\056\145\163\057\060\051\006\011\140\206
\110\001\206\370\102\001\002\004\034\026\032\150\164\164\160\072
\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\060\073\006\011\140\206\110\001\206\370\102
\001\004\004\056\026\054\150\164\164\160\072\057\057\167\167\167
\056\151\160\163\056\145\163\057\151\160\163\062\060\060\062\057
\151\160\163\062\060\060\062\103\114\101\123\105\101\063\056\143
\162\154\060\100\006\011\140\206\110\001\206\370\102\001\003\004
\063\026\061\150\164\164\160\072\057\057\167\167\167\056\151\160
\163\056\145\163\057\151\160\163\062\060\060\062\057\162\145\166
\157\143\141\164\151\157\156\103\114\101\123\105\101\063\056\150
\164\155\154\077\060\075\006\011\140\206\110\001\206\370\102\001
\007\004\060\026\056\150\164\164\160\072\057\057\167\167\167\056
\151\160\163\056\145\163\057\151\160\163\062\060\060\062\057\162
\145\156\145\167\141\154\103\114\101\123\105\101\063\056\150\164
\155\154\077\060\073\006\011\140\206\110\001\206\370\102\001\010
\004\056\026\054\150\164\164\160\072\057\057\167\167\167\056\151
\160\163\056\145\163\057\151\160\163\062\060\060\062\057\160\157
\154\151\143\171\103\114\101\123\105\101\063\056\150\164\155\154
\060\165\006\003\125\035\037\004\156\060\154\060\062\240\060\240


```
\056\206\054\150\164\164\160\072\057\057\167\167\167\056\151\160
\163\056\145\163\057\151\160\163\062\060\060\062\057\151\160\163
\062\060\060\062\103\114\101\123\105\101\063\056\143\162\154\060
\066\240\064\240\062\206\060\150\164\164\160\072\057\057\167\167
\167\142\141\143\153\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\151\160\163\062\060\060\062\103\114\101\123
\105\101\063\056\143\162\154\060\057\006\010\053\006\001\005\005
\007\001\001\004\043\060\041\060\037\006\010\053\006\001\005\005
\007\060\001\206\023\150\164\164\160\072\057\057\157\143\163\160
\056\151\160\163\056\145\163\057\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\201\201\000\112\075\040\107\032
\332\211\364\172\053\061\171\354\001\300\314\001\365\326\301\374
\310\303\363\120\002\121\220\130\052\237\347\065\011\133\060\012
\201\000\045\107\257\324\017\016\236\140\046\250\225\247\203\010
\337\055\254\351\016\367\234\310\237\313\223\105\361\272\152\306
\147\121\112\151\117\153\376\175\013\057\122\051\302\120\255\044
\104\355\043\263\110\313\104\100\301\003\225\014\012\170\006\022
\001\365\221\061\055\111\215\273\077\105\116\054\340\350\315\265
\311\024\025\014\343\007\203\233\046\165\357
```

END

#

Trust for Certificate "IPS CLASEA3 root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "IPS CLASEA3 root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\026\324\044\376\226\020\341\165\031\257\043\053\266\207\164\342
\101\104\276\156
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\006\371\353\354\314\126\235\210\272\220\365\272\260\032\340\002
```

CKA_ISSUER MULTILINE_OCTAL

```
\060\202\001\024\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\057\060\055\006\003\125\004\013\023
\046\111\120\123\040\103\101\040\103\114\101\123\105\101\063\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
```

```
\164\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003
\023\046\111\120\123\040\103\101\040\103\114\101\123\105\101\063
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\061\036\060\034\006\011\052\206
\110\206\367\015\001\011\001\026\017\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING
CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "IPS Timestamping root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IPS Timestamping root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\202\001\036\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\064\060\062\006\003\125\004\013\023
\053\111\120\123\040\103\101\040\124\151\155\145\163\164\141\155
\160\151\156\147\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\061\064\060\062
\006\003\125\004\003\023\053\111\120\123\040\103\101\040\124\151
\155\145\163\164\141\155\160\151\156\147\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\061\036\060\034\006\011\052\206\110\206\367\015\001\011
\001\026\017\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163
END
CKA_ID
```

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\202\001\036\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\064\060\062\006\003\125\004\013\023
\053\111\120\123\040\103\101\040\124\151\155\145\163\164\141\155
\160\151\156\147\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\061\064\060\062
\006\003\125\004\003\023\053\111\120\123\040\103\101\040\124\151
\155\145\163\164\141\155\160\151\156\147\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\061\036\060\034\006\011\052\206\110\206\367\015\001\011
\001\026\017\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\010\070\060\202\007\241\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\202\001\036\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143\145
\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011\102
\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125\004
\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164\040
\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166\151
\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125\004
\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060\071
\062\071\064\065\062\061\064\060\062\006\003\125\004\013\023\053
\111\120\123\040\103\101\040\124\151\155\145\163\164\141\155\160
\151\156\147\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\064\060\062\006
\003\125\004\003\023\053\111\120\123\040\103\101\040\124\151\155
\145\163\164\141\155\160\151\156\147\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\036\060\034\006\011\052\206\110\206\367\015\001\011\001
\026\017\151\160\163\100\155\141\151\154\056\151\160\163\056\145
\163\060\036\027\015\060\061\061\062\062\071\060\061\061\060\061

\070\132\027\015\062\065\061\062\062\067\060\061\061\060\061\070
\132\060\202\001\036\061\013\060\011\006\003\125\004\006\023\002
\105\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162
\143\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023
\011\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003
\125\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145
\164\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162
\166\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003
\125\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160
\163\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066
\060\071\062\071\064\065\062\061\064\060\062\006\003\125\004\013
\023\053\111\120\123\040\103\101\040\124\151\155\145\163\164\141
\155\160\151\156\147\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\101\165\164\150\157\162\151\164\171\061\064\060
\062\006\003\125\004\003\023\053\111\120\123\040\103\101\040\124
\151\155\145\163\164\141\155\160\151\156\147\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\061\036\060\034\006\011\052\206\110\206\367\015\001
\011\001\026\017\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\060\201\237\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\201\215\000\060\201\211\002\201\201\000
\274\270\356\126\245\232\214\346\066\311\302\142\240\146\201\215
\032\325\172\322\163\237\016\204\144\272\225\264\220\247\170\257
\312\376\124\141\133\316\262\040\127\001\256\104\222\103\020\070
\021\367\150\374\027\100\245\150\047\062\073\304\247\346\102\161
\305\231\357\166\377\053\225\044\365\111\222\030\150\312\000\265
\244\132\057\156\313\326\033\054\015\124\147\153\172\051\241\130
\253\242\132\000\326\133\273\030\302\337\366\036\023\126\166\233
\245\150\342\230\316\306\003\212\064\333\114\203\101\246\251\243
\002\003\001\000\001\243\202\004\200\060\202\004\174\060\035\006
\003\125\035\016\004\026\004\024\213\320\020\120\011\201\362\235
\011\325\016\140\170\003\042\242\077\310\312\146\060\202\001\120
\006\003\125\035\043\004\202\001\107\060\202\001\103\200\024\213
\320\020\120\011\201\362\235\011\325\016\140\170\003\042\242\077
\310\312\146\241\202\001\046\244\202\001\042\060\202\001\036\061
\013\060\011\006\003\125\004\006\023\002\105\123\061\022\060\020
\006\003\125\004\010\023\011\102\141\162\143\145\154\157\156\141
\061\022\060\020\006\003\125\004\007\023\011\102\141\162\143\145
\154\157\156\141\061\056\060\054\006\003\125\004\012\023\045\111
\120\123\040\111\156\164\145\162\156\145\164\040\160\165\142\154
\151\163\150\151\156\147\040\123\145\162\166\151\143\145\163\040
\163\056\154\056\061\053\060\051\006\003\125\004\012\024\042\151
\160\163\100\155\141\151\154\056\151\160\163\056\145\163\040\103
\056\111\056\106\056\040\040\102\055\066\060\071\062\071\064\065
\062\061\064\060\062\006\003\125\004\013\023\053\111\120\123\040
\103\101\040\124\151\155\145\163\164\141\155\160\151\156\147\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165
\164\150\157\162\151\164\171\061\064\060\062\006\003\125\004\003

\023\053\111\120\123\040\103\101\040\124\151\155\145\163\164\141
\155\160\151\156\147\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\101\165\164\150\157\162\151\164\171\061\036\060
\034\006\011\052\206\110\206\367\015\001\011\001\026\017\151\160
\163\100\155\141\151\154\056\151\160\163\056\145\163\202\001\000
\060\014\006\003\125\035\023\004\005\060\003\001\001\377\060\014
\006\003\125\035\017\004\005\003\003\007\377\200\060\153\006\003
\125\035\045\004\144\060\142\006\010\053\006\001\005\005\007\003
\001\006\010\053\006\001\005\005\007\003\002\006\010\053\006\001
\005\005\007\003\003\006\010\053\006\001\005\005\007\003\004\006
\010\053\006\001\005\005\007\003\010\006\012\053\006\001\004\001
\202\067\002\001\025\006\012\053\006\001\004\001\202\067\002\001
\026\006\012\053\006\001\004\001\202\067\012\003\001\006\012\053
\006\001\004\001\202\067\012\003\004\060\021\006\011\140\206\110
\001\206\370\102\001\001\004\004\003\002\000\007\060\032\006\003
\125\035\021\004\023\060\021\201\017\151\160\163\100\155\141\151
\154\056\151\160\163\056\145\163\060\032\006\003\125\035\022\004
\023\060\021\201\017\151\160\163\100\155\141\151\154\056\151\160
\163\056\145\163\060\107\006\011\140\206\110\001\206\370\102\001
\015\004\072\026\070\124\151\155\145\163\164\141\155\160\151\156
\147\040\103\101\040\103\145\162\164\151\146\151\143\141\164\145
\040\151\163\163\165\145\144\040\142\171\040\150\164\164\160\072
\057\057\167\167\167\056\151\160\163\056\145\163\057\060\051\006
\011\140\206\110\001\206\370\102\001\002\004\034\026\032\150\164
\164\160\072\057\057\167\167\167\056\151\160\163\056\145\163\057
\151\160\163\062\060\060\062\057\060\100\006\011\140\206\110\001
\206\370\102\001\004\004\063\026\061\150\164\164\160\072\057\057
\167\167\167\056\151\160\163\056\145\163\057\151\160\163\062\060
\060\062\057\151\160\163\062\060\060\062\124\151\155\145\163\164
\141\155\160\151\156\147\056\143\162\154\060\105\006\011\140\206
\110\001\206\370\102\001\003\004\070\026\066\150\164\164\160\072
\057\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163
\062\060\060\062\057\162\145\166\157\143\141\164\151\157\156\124
\151\155\145\163\164\141\155\160\151\156\147\056\150\164\155\154
\077\060\102\006\011\140\206\110\001\206\370\102\001\007\004\065
\026\063\150\164\164\160\072\057\057\167\167\167\056\151\160\163
\056\145\163\057\151\160\163\062\060\060\062\057\162\145\156\145
\167\141\154\124\151\155\145\163\164\141\155\160\151\156\147\056
\150\164\155\154\077\060\100\006\011\140\206\110\001\206\370\102
\001\010\004\063\026\061\150\164\164\160\072\057\057\167\167\167
\056\151\160\163\056\145\163\057\151\160\163\062\060\060\062\057
\160\157\154\151\143\171\124\151\155\145\163\164\141\155\160\151
\156\147\056\150\164\155\154\060\177\006\003\125\035\037\004\170
\060\166\060\067\240\065\240\063\206\061\150\164\164\160\072\057
\057\167\167\167\056\151\160\163\056\145\163\057\151\160\163\062
\060\060\062\057\151\160\163\062\060\060\062\124\151\155\145\163
\164\141\155\160\151\156\147\056\143\162\154\060\073\240\071\240
\067\206\065\150\164\164\160\072\057\057\167\167\167\142\141\143

```
\153\056\151\160\163\056\145\163\057\151\160\163\062\060\060\062
\057\151\160\163\062\060\060\062\124\151\155\145\163\164\141\155
\160\151\156\147\056\143\162\154\060\057\006\010\053\006\001\005
\005\007\001\001\004\043\060\041\060\037\006\010\053\006\001\005
\005\007\060\001\206\023\150\164\164\160\072\057\057\157\143\163
\160\056\151\160\163\056\145\163\057\060\015\006\011\052\206\110
\206\367\015\001\001\005\005\000\003\201\201\000\145\272\301\314
\000\032\225\221\312\351\154\072\277\072\036\024\010\174\373\203
\356\153\142\121\323\063\221\265\140\171\176\004\330\135\171\067
\350\303\133\260\304\147\055\150\132\262\137\016\012\372\315\077
\072\105\241\352\066\317\046\036\247\021\050\305\224\217\204\114
\123\010\305\223\263\374\342\177\365\215\363\261\251\205\137\210
\336\221\226\356\027\133\256\245\352\160\145\170\054\041\144\001
\225\316\316\114\076\120\364\266\131\313\143\215\266\275\030\324
\207\112\137\334\357\351\126\360\012\014\350\165
```

END

#

Trust for Certificate "IPS Timestamping root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "IPS Timestamping root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\226\231\134\167\021\350\345\055\371\343\113\354\354\147\323\313
\361\266\304\322
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\056\003\375\305\365\327\053\224\144\301\276\211\061\361\026\233
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\202\001\036\061\013\060\011\006\003\125\004\006\023\002\105
\123\061\022\060\020\006\003\125\004\010\023\011\102\141\162\143
\145\154\157\156\141\061\022\060\020\006\003\125\004\007\023\011
\102\141\162\143\145\154\157\156\141\061\056\060\054\006\003\125
\004\012\023\045\111\120\123\040\111\156\164\145\162\156\145\164
\040\160\165\142\154\151\163\150\151\156\147\040\123\145\162\166
\151\143\145\163\040\163\056\154\056\061\053\060\051\006\003\125
\004\012\024\042\151\160\163\100\155\141\151\154\056\151\160\163
\056\145\163\040\103\056\111\056\106\056\040\040\102\055\066\060
\071\062\071\064\065\062\061\064\060\062\006\003\125\004\013\023
\053\111\120\123\040\103\101\040\124\151\155\145\163\164\141\155
\160\151\156\147\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\061\064\060\062
\006\003\125\004\003\023\053\111\120\123\040\103\101\040\124\151
\155\145\163\164\141\155\160\151\156\147\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
```

```

\164\171\061\036\060\034\006\011\052\206\110\206\367\015\001\011
\001\026\017\151\160\163\100\155\141\151\154\056\151\160\163\056
\145\163
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "QuoVadis Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "QuoVadis Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\045\060\043\006\003
\125\004\013\023\034\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\056\060\054\006\003\125\004\003\023\045\121\165\157\126
\141\144\151\163\040\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\045\060\043\006\003
\125\004\013\023\034\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\056\060\054\006\003\125\004\003\023\045\121\165\157\126
\141\144\151\163\040\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\072\266\120\213

```

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\320\060\202\004\270\240\003\002\001\002\002\004\072
\266\120\213\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\177\061\013\060\011\006\003\125\004\006\023\002\102
\115\061\031\060\027\006\003\125\004\012\023\020\121\165\157\126
\141\144\151\163\040\114\151\155\151\164\145\144\061\045\060\043
\006\003\125\004\013\023\034\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\061\056\060\054\006\003\125\004\003\023\045\121\165
\157\126\141\144\151\163\040\122\157\157\164\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\060\036\027\015\060\061\060\063\061\071\061\070\063
\063\063\063\132\027\015\062\061\060\063\061\067\061\070\063\063
\063\063\132\060\177\061\013\060\011\006\003\125\004\006\023\002
\102\115\061\031\060\027\006\003\125\004\012\023\020\121\165\157
\126\141\144\151\163\040\114\151\155\151\164\145\144\061\045\060
\043\006\003\125\004\013\023\034\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\061\056\060\054\006\003\125\004\003\023\045\121
\165\157\126\141\144\151\163\040\122\157\157\164\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\060\202\001\042\060\015\006\011\052\206\110\206
\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012
\002\202\001\001\000\277\141\265\225\123\272\127\374\372\362\147
\013\072\032\337\021\200\144\225\264\321\274\315\172\317\366\051
\226\056\044\124\100\044\070\367\032\205\334\130\114\313\244\047
\102\227\320\237\203\212\303\344\006\003\133\000\245\121\036\160
\004\164\342\301\324\072\253\327\255\073\007\030\005\216\375\203
\254\352\146\331\030\033\150\212\365\127\032\230\272\365\355\166
\075\174\331\336\224\152\073\113\027\301\325\217\275\145\070\072
\225\320\075\125\066\116\337\171\127\061\052\036\330\131\145\111
\130\040\230\176\253\137\176\237\351\326\115\354\203\164\251\307
\154\330\356\051\112\205\052\006\024\371\124\346\323\332\145\007
\213\143\067\022\327\320\354\303\173\040\101\104\243\355\313\240
\027\341\161\145\316\035\146\061\367\166\001\031\310\175\003\130
\266\225\111\035\246\022\046\350\306\014\166\340\343\146\313\352
\135\246\046\356\345\314\137\275\147\247\001\047\016\242\312\124
\305\261\172\225\035\161\036\112\051\212\003\334\152\105\301\244
\031\136\157\066\315\303\242\260\267\376\134\070\342\122\274\370
\104\103\346\220\273\002\003\001\000\001\243\202\002\122\060\202
\002\116\060\075\006\010\053\006\001\005\005\007\001\001\004\061
\060\057\060\055\006\010\053\006\001\005\005\007\060\001\206\041
\150\164\164\160\163\072\057\057\157\143\163\160\056\161\165\157
\166\141\144\151\163\157\146\146\163\150\157\162\145\056\143\157
\155\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001
\001\377\060\202\001\032\006\003\125\035\040\004\202\001\021\060
\202\001\015\060\202\001\011\006\011\053\006\001\004\001\276\130

\000\001\060\201\373\060\201\324\006\010\053\006\001\005\005\007
\002\002\060\201\307\032\201\304\122\145\154\151\141\156\143\145
\040\157\156\040\164\150\145\040\121\165\157\126\141\144\151\163
\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164
\145\040\142\171\040\141\156\171\040\160\141\162\164\171\040\141
\163\163\165\155\145\163\040\141\143\143\145\160\164\141\156\143
\145\040\157\146\040\164\150\145\040\164\150\145\156\040\141\160
\160\154\151\143\141\142\154\145\040\163\164\141\156\144\141\162
\144\040\164\145\162\155\163\040\141\156\144\040\143\157\156\144
\151\164\151\157\156\163\040\157\146\040\165\163\145\054\040\143
\145\162\164\151\146\151\143\141\164\151\157\156\040\160\162\141
\143\164\151\143\145\163\054\040\141\156\144\040\164\150\145\040
\121\165\157\126\141\144\151\163\040\103\145\162\164\151\146\151
\143\141\164\145\040\120\157\154\151\143\171\056\060\042\006\010
\053\006\001\005\005\007\002\001\026\026\150\164\164\160\072\057
\057\167\167\167\056\161\165\157\166\141\144\151\163\056\142\155
\060\035\006\003\125\035\016\004\026\004\024\213\113\155\355\323
\051\271\006\031\354\071\071\251\360\227\204\152\313\357\337\060
\201\256\006\003\125\035\043\004\201\246\060\201\243\200\024\213
\113\155\355\323\051\271\006\031\354\071\071\251\360\227\204\152
\313\357\337\241\201\204\244\201\201\060\177\061\013\060\011\006
\003\125\004\006\023\002\102\115\061\031\060\027\006\003\125\004
\012\023\020\121\165\157\126\141\144\151\163\040\114\151\155\151
\164\145\144\061\045\060\043\006\003\125\004\013\023\034\122\157
\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\061\056\060\054\006\003
\125\004\003\023\045\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171\202\004\072\266\120\213
\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\212\324\024\265\376\364\232\222\247\031\324\244
\176\162\030\217\331\150\174\122\044\335\147\157\071\172\304\252
\136\075\342\130\260\115\160\230\204\141\350\033\343\151\030\016
\316\373\107\120\240\116\377\360\044\037\275\262\316\365\047\374
\354\057\123\252\163\173\003\075\164\156\346\026\236\353\245\056
\304\277\126\047\120\053\142\272\276\113\034\074\125\134\101\035
\044\276\202\040\107\135\325\104\176\172\026\150\337\175\115\121
\160\170\127\035\063\036\375\002\231\234\014\315\012\005\117\307
\273\216\244\165\372\112\155\261\200\216\011\126\271\234\032\140
\376\135\301\327\172\334\021\170\320\326\135\301\267\325\255\062
\231\003\072\212\314\124\045\071\061\201\173\023\042\121\272\106
\154\241\273\236\372\004\154\111\046\164\217\322\163\353\314\060
\242\346\352\131\042\207\370\227\365\016\375\352\314\222\244\026
\304\122\030\352\041\316\261\361\346\204\201\345\272\251\206\050
\362\103\132\135\022\235\254\036\331\250\345\012\152\247\177\240
\207\051\317\362\211\115\324\354\305\342\346\172\320\066\043\212
\112\164\066\371

END

#

Trust for Certificate "QuoVadis Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN

CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "QuoVadis Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\336\077\100\275\120\223\323\233\154\140\366\332\274\007\142\001
\000\211\166\311

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\047\336\066\376\162\267\000\003\000\235\364\360\036\154\004\044

END

CKA_ISSUER MULTILINE_OCTAL

\060\177\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\045\060\043\006\003
\125\004\013\023\034\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\061\056\060\054\006\003\125\004\003\023\045\121\165\157\126
\141\144\151\163\040\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\004\072\266\120\213

END

CKA_TRUST_SERVER_AUTH CK_TRUST

CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "QuoVadis Root CA 2"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "QuoVadis Root CA 2"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061

\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\062

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\062

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\002\005\011

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\267\060\202\003\237\240\003\002\001\002\002\002\005
\011\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\062\060\036\027\015\060\066\061\061\062
\064\061\070\062\067\060\060\132\027\015\063\061\061\061\062\064
\061\070\062\063\063\063\132\060\105\061\013\060\011\006\003\125
\004\006\023\002\102\115\061\031\060\027\006\003\125\004\012\023
\020\121\165\157\126\141\144\151\163\040\114\151\155\151\164\145
\144\061\033\060\031\006\003\125\004\003\023\022\121\165\157\126
\141\144\151\163\040\122\157\157\164\040\103\101\040\062\060\202
\002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\232
\030\312\113\224\015\000\055\257\003\051\212\360\017\201\310\256
\114\031\205\035\010\237\253\051\104\205\363\057\201\255\062\036
\220\106\277\243\206\046\032\036\376\176\034\030\072\134\234\140
\027\052\072\164\203\063\060\175\141\124\021\313\355\253\340\346
\322\242\176\365\153\157\030\267\012\013\055\375\351\076\357\012
\306\263\020\351\334\302\106\027\370\135\375\244\332\377\236\111
\132\234\346\063\346\044\226\367\077\272\133\053\034\172\065\302
\326\147\376\253\146\120\213\155\050\140\053\357\327\140\303\307
\223\274\215\066\221\363\177\370\333\021\023\304\234\167\166\301
\256\267\002\152\201\172\251\105\203\342\005\346\271\126\301\224
\067\217\110\161\143\042\354\027\145\007\225\212\113\337\217\306
\132\012\345\260\343\137\136\153\021\253\014\371\205\353\104\351
\370\004\163\362\351\376\134\230\214\365\163\257\153\264\176\315
\324\134\002\053\114\071\341\262\225\225\055\102\207\327\325\263
\220\103\267\154\023\361\336\335\366\304\370\211\077\321\165\365

\222\303\221\325\212\210\320\220\354\334\155\336\211\302\145\161
\226\213\015\003\375\234\277\133\026\254\222\333\352\376\171\174
\255\353\257\367\026\313\333\315\045\053\345\037\373\232\237\342
\121\314\072\123\014\110\346\016\275\311\264\166\006\122\346\021
\023\205\162\143\003\004\340\004\066\053\040\031\002\350\164\247
\037\266\311\126\146\360\165\045\334\147\301\016\141\140\210\263
\076\321\250\374\243\332\035\260\321\261\043\124\337\104\166\155
\355\101\330\301\262\042\266\123\034\337\065\035\334\241\167\052
\061\344\055\365\345\345\333\310\340\377\345\200\327\013\143\240
\377\063\241\017\272\054\025\025\352\227\263\322\242\265\276\362
\214\226\036\032\217\035\154\244\141\067\271\206\163\063\327\227
\226\236\043\175\202\244\114\201\342\241\321\272\147\137\225\007
\243\047\021\356\026\020\173\274\105\112\114\262\004\322\253\357
\325\375\014\121\316\120\152\010\061\371\221\332\014\217\144\134
\003\303\072\213\040\077\156\215\147\075\072\326\376\175\133\210
\311\136\373\314\141\334\213\063\167\323\104\062\065\011\142\004
\222\026\020\330\236\047\107\373\073\041\343\370\353\035\133\002
\003\001\000\001\243\201\260\060\201\255\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\013\006\003\125
\035\017\004\004\003\002\001\006\060\035\006\003\125\035\016\004
\026\004\024\032\204\142\274\110\114\063\045\004\324\356\320\366
\003\304\031\106\321\224\153\060\156\006\003\125\035\043\004\147
\060\145\200\024\032\204\142\274\110\114\063\045\004\324\356\320
\366\003\304\031\106\321\224\153\241\111\244\107\060\105\061\013
\060\011\006\003\125\004\006\023\002\102\115\061\031\060\027\006
\003\125\004\012\023\020\121\165\157\126\141\144\151\163\040\114
\151\155\151\164\145\144\061\033\060\031\006\003\125\004\003\023
\022\121\165\157\126\141\144\151\163\040\122\157\157\164\040\103
\101\040\062\202\002\005\011\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\003\202\002\001\000\076\012\026\115\237
\006\133\250\256\161\135\057\005\057\147\346\023\105\203\304\066
\366\363\300\046\014\015\265\107\144\135\370\264\162\311\106\245
\003\030\047\125\211\170\175\166\352\226\064\200\027\040\334\347
\203\370\215\374\007\270\332\137\115\056\147\262\204\375\331\104
\374\167\120\201\346\174\264\311\015\013\162\123\370\166\007\007
\101\107\226\014\373\340\202\046\223\125\214\376\042\037\140\145
\174\137\347\046\263\367\062\220\230\120\324\067\161\125\366\222
\041\170\367\225\171\372\370\055\046\207\146\126\060\167\246\067
\170\063\122\020\130\256\077\141\216\362\152\261\357\030\176\112
\131\143\312\215\242\126\325\247\057\274\126\037\317\071\301\342
\373\012\250\025\054\175\115\172\143\306\154\227\104\074\322\157
\303\112\027\012\370\220\322\127\242\031\121\245\055\227\101\332
\007\117\251\120\332\220\215\224\106\341\076\360\224\375\020\000
\070\365\073\350\100\341\264\156\126\032\040\314\157\130\215\355
\056\105\217\326\351\223\077\347\261\054\337\072\326\042\214\334
\204\273\042\157\320\370\344\306\071\351\004\210\074\303\272\353
\125\172\155\200\231\044\365\154\001\373\370\227\260\224\133\353
\375\322\157\361\167\150\015\065\144\043\254\270\125\241\003\321

```
\115\102\031\334\370\165\131\126\243\371\250\111\171\370\257\016
\271\021\240\174\267\152\355\064\320\266\046\142\070\032\207\014
\370\350\375\056\323\220\177\007\221\052\035\326\176\134\205\203
\231\260\070\010\077\351\136\371\065\007\344\311\142\156\127\177
\247\120\225\367\272\310\233\346\216\242\001\305\326\146\277\171
\141\363\074\034\341\271\202\134\135\240\303\351\330\110\275\031
\242\021\024\031\156\262\206\033\150\076\110\067\032\210\267\135
\226\136\234\307\357\047\142\010\342\221\031\134\322\361\041\335
\272\027\102\202\227\161\201\123\061\251\237\366\175\142\277\162
\341\243\223\035\314\212\046\132\011\070\320\316\327\015\200\026
\264\170\245\072\207\114\215\212\245\325\106\227\362\054\020\271
\274\124\042\300\001\120\151\103\236\364\262\357\155\370\354\332
\361\343\261\357\337\221\217\124\052\013\045\301\046\031\304\122
\020\005\145\325\202\020\352\302\061\315\056
END
```

#

```
Trust for Certificate "QuoVadis Root CA 2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "QuoVadis Root CA 2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\312\072\373\317\022\100\066\113\104\262\026\040\210\200\110\071
\031\223\174\367
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\136\071\173\335\370\272\354\202\351\254\142\272\014\124\000\053
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\062
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\002\005\011
END
```

```
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

#

```
# Certificate "QuoVadis Root CA 3"
```

```
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "QuoVadis Root CA 3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\063
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\063
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\002\005\306
END
CKA_VALUE MULTILINE_OCTAL
\060\202\006\235\060\202\004\205\240\003\002\001\002\002\002\005
\306\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061
\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144
\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003
\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157
\157\164\040\103\101\040\063\060\036\027\015\060\066\061\061\062
\064\061\071\061\061\062\063\132\027\015\063\061\061\061\062\064
\061\071\060\066\064\064\132\060\105\061\013\060\011\006\003\125
\004\006\023\002\102\115\061\031\060\027\006\003\125\004\012\023
\020\121\165\157\126\141\144\151\163\040\114\151\155\151\164\145
\144\061\033\060\031\006\003\125\004\003\023\022\121\165\157\126
\141\144\151\163\040\122\157\157\164\040\103\101\040\063\060\202
\002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\314
\127\102\026\124\234\346\230\323\323\115\356\376\355\307\237\103
\071\112\145\263\350\026\210\064\333\015\131\221\164\317\222\270
\004\100\255\002\113\061\253\274\215\221\150\330\040\016\032\001
\342\032\173\116\027\135\342\212\267\077\231\032\315\353\141\253
\302\145\246\037\267\267\275\267\217\374\375\160\217\013\240\147
\276\001\242\131\317\161\346\017\051\166\377\261\126\171\105\053
```

\037\236\172\124\350\243\051\065\150\244\001\117\017\244\056\067
\357\033\277\343\217\020\250\162\253\130\127\347\124\206\310\311
\363\133\332\054\332\135\216\156\074\243\076\332\373\202\345\335
\362\134\262\005\063\157\212\066\316\320\023\116\377\277\112\014
\064\114\246\303\041\275\120\004\125\353\261\273\235\373\105\036
\144\025\336\125\001\214\002\166\265\313\241\077\102\151\274\057
\275\150\103\026\126\211\052\067\141\221\375\246\256\116\300\313
\024\145\224\067\113\222\006\357\004\320\310\234\210\333\013\173
\201\257\261\075\052\304\145\072\170\266\356\334\200\261\322\323
\231\234\072\356\153\132\153\263\215\267\325\316\234\302\276\245
\113\057\026\261\236\150\073\006\157\256\175\237\370\336\354\314
\051\247\230\243\045\103\057\357\361\137\046\341\210\115\370\136
\156\327\331\024\156\031\063\151\247\073\204\211\223\304\123\125
\023\241\121\170\100\370\270\311\242\356\173\272\122\102\203\236
\024\355\005\122\132\131\126\247\227\374\235\077\012\051\330\334
\117\221\016\023\274\336\225\244\337\213\231\276\254\233\063\210
\357\265\201\257\033\306\042\123\310\366\307\356\227\024\260\305
\174\170\122\310\360\316\156\167\140\204\246\351\052\166\040\355
\130\001\027\060\223\351\032\213\340\163\143\331\152\222\224\111
\116\264\255\112\205\304\243\042\060\374\011\355\150\042\163\246
\210\014\125\041\130\305\341\072\237\052\335\312\341\220\340\331
\163\253\154\200\270\350\013\144\223\240\234\214\031\377\263\322
\014\354\221\046\207\212\263\242\341\160\217\054\012\345\315\155
\150\121\353\332\077\005\177\213\062\346\023\134\153\376\137\100
\342\042\310\264\264\144\117\326\272\175\110\076\250\151\014\327
\273\206\161\311\163\270\077\073\235\045\113\332\377\100\353\002
\003\001\000\001\243\202\001\225\060\202\001\221\060\017\006\003
\125\035\023\001\001\377\004\005\060\003\001\001\377\060\201\341
\006\003\125\035\040\004\201\331\060\201\326\060\201\323\006\011
\053\006\001\004\001\276\130\000\003\060\201\305\060\201\223\006
\010\053\006\001\005\005\007\002\002\060\201\206\032\201\203\101
\156\171\040\165\163\145\040\157\146\040\164\150\151\163\040\103
\145\162\164\151\146\151\143\141\164\145\040\143\157\156\163\164
\151\164\165\164\145\163\040\141\143\143\145\160\164\141\156\143
\145\040\157\146\040\164\150\145\040\121\165\157\126\141\144\151
\163\040\122\157\157\164\040\103\101\040\063\040\103\145\162\164
\151\146\151\143\141\164\145\040\120\157\154\151\143\171\040\057
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\120
\162\141\143\164\151\143\145\040\123\164\141\164\145\155\145\156
\164\056\060\055\006\010\053\006\001\005\005\007\002\001\026\041
\150\164\164\160\072\057\057\167\167\167\056\161\165\157\166\141
\144\151\163\147\154\157\142\141\154\056\143\157\155\057\143\160
\163\060\013\006\003\125\035\017\004\004\003\002\001\006\060\035
\006\003\125\035\016\004\026\004\024\362\300\023\340\202\103\076
\373\356\057\147\062\226\065\134\333\270\313\002\320\060\156\006
\003\125\035\043\004\147\060\145\200\024\362\300\023\340\202\103
\076\373\356\057\147\062\226\065\134\333\270\313\002\320\241\111
\244\107\060\105\061\013\060\011\006\003\125\004\006\023\002\102

\115\061\031\060\027\006\003\125\004\012\023\020\121\165\157\126
\141\144\151\163\040\114\151\155\151\164\145\144\061\033\060\031
\006\003\125\004\003\023\022\121\165\157\126\141\144\151\163\040
\122\157\157\164\040\103\101\040\063\202\002\005\306\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\002\001
\000\117\255\240\054\114\372\300\362\157\367\146\125\253\043\064
\356\347\051\332\303\133\266\260\203\331\320\320\342\041\373\363
\140\247\073\135\140\123\047\242\233\366\010\042\052\347\277\240
\162\345\234\044\152\061\261\220\172\047\333\204\021\211\047\246
\167\132\070\327\277\254\206\374\356\135\203\274\006\306\321\167
\153\017\155\044\057\113\172\154\247\007\226\312\343\204\237\255
\210\213\035\253\026\215\133\146\027\331\026\364\213\200\322\335
\370\262\166\303\374\070\023\252\014\336\102\151\053\156\363\074
\353\200\047\333\365\246\104\015\237\132\125\131\013\325\015\122
\110\305\256\237\362\057\200\305\352\062\120\065\022\227\056\301
\341\377\361\043\210\121\070\237\362\146\126\166\347\017\121\227
\245\122\014\115\111\121\225\066\075\277\242\113\014\020\035\206
\231\114\252\363\162\021\223\344\352\366\233\332\250\135\247\115
\267\236\002\256\163\000\310\332\043\003\350\371\352\031\164\142
\000\224\313\042\040\276\224\247\131\265\202\152\276\231\171\172
\251\362\112\044\122\367\164\375\272\116\346\250\035\002\156\261
\015\200\104\301\256\323\043\067\137\273\205\174\053\222\056\350
\176\245\213\335\231\341\277\047\157\055\135\252\173\207\376\012
\335\113\374\216\365\046\344\156\160\102\156\063\354\061\236\173
\223\301\344\311\151\032\075\300\153\116\042\155\356\253\130\115
\306\320\101\301\053\352\117\022\207\136\353\105\330\154\365\230
\002\323\240\330\125\212\006\231\031\242\240\167\321\060\236\254
\314\165\356\203\365\260\142\071\317\154\127\342\114\322\221\013
\016\165\050\033\232\277\375\032\103\361\312\167\373\073\217\141
\270\151\050\026\102\004\136\160\052\034\041\330\217\341\275\043
\133\055\164\100\222\331\143\031\015\163\335\151\274\142\107\274
\340\164\053\262\353\175\276\101\033\265\300\106\305\241\042\313
\137\116\301\050\222\336\030\272\325\052\050\273\021\213\027\223
\230\231\140\224\134\043\317\132\047\227\136\013\005\006\223\067
\036\073\151\066\353\251\236\141\035\217\062\332\216\014\326\164
\076\173\011\044\332\001\167\107\304\073\315\064\214\231\365\312
\341\045\141\063\262\131\033\342\156\327\067\127\266\015\251\022
\332
END

#

Trust for Certificate "QuoVadis Root CA 3"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "QuoVadis Root CA 3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\037\111\024\367\330\164\225\035\335\256\002\300\276\375\072\055

\202\165\121\205

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\061\205\074\142\224\227\143\271\252\375\211\116\257\157\340\317

END

CKA_ISSUER MULTILINE_OCTAL

\060\105\061\013\060\011\006\003\125\004\006\023\002\102\115\061

\031\060\027\006\003\125\004\012\023\020\121\165\157\126\141\144

\151\163\040\114\151\155\151\164\145\144\061\033\060\031\006\003

\125\004\003\023\022\121\165\157\126\141\144\151\163\040\122\157

\157\164\040\103\101\040\063

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\002\005\306

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Security Communication Root CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Security Communication Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\120\061\013\060\011\006\003\125\004\006\023\002\112\120\061

\030\060\026\006\003\125\004\012\023\017\123\105\103\117\115\040

\124\162\165\163\164\056\156\145\164\061\047\060\045\006\003\125

\004\013\023\036\123\145\143\165\162\151\164\171\040\103\157\155

\155\165\156\151\143\141\164\151\157\156\040\122\157\157\164\103

\101\061

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\120\061\013\060\011\006\003\125\004\006\023\002\112\120\061

\030\060\026\006\003\125\004\012\023\017\123\105\103\117\115\040

\124\162\165\163\164\056\156\145\164\061\047\060\045\006\003\125

\004\013\023\036\123\145\143\165\162\151\164\171\040\103\157\155

\155\165\156\151\143\141\164\151\157\156\040\122\157\157\164\103

\101\061

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\132\060\202\002\102\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\120\061\013\060\011\006\003\125\004\006\023\002\112\120\061\030
\060\026\006\003\125\004\012\023\017\123\105\103\117\115\040\124
\162\165\163\164\056\156\145\164\061\047\060\045\006\003\125\004
\013\023\036\123\145\143\165\162\151\164\171\040\103\157\155\155
\165\156\151\143\141\164\151\157\156\040\122\157\157\164\103\101
\061\060\036\027\015\060\063\060\071\063\060\060\064\062\060\064
\071\132\027\015\062\063\060\071\063\060\060\064\062\060\064\071
\132\060\120\061\013\060\011\006\003\125\004\006\023\002\112\120
\061\030\060\026\006\003\125\004\012\023\017\123\105\103\117\115
\040\124\162\165\163\164\056\156\145\164\061\047\060\045\006\003
\125\004\013\023\036\123\145\143\165\162\151\164\171\040\103\157
\155\155\165\156\151\143\141\164\151\157\156\040\122\157\157\164
\103\101\061\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002
\202\001\001\000\263\263\376\177\323\155\261\357\026\174\127\245
\014\155\166\212\057\113\277\144\373\114\356\212\360\363\051\174
\365\377\356\052\340\351\351\272\133\144\042\232\232\157\054\072
\046\151\121\005\231\046\334\325\034\152\161\306\232\175\036\235
\335\174\154\306\214\147\147\112\076\370\161\260\031\047\251\011
\014\246\225\277\113\214\014\372\125\230\073\330\350\042\241\113
\161\070\171\254\227\222\151\263\211\176\352\041\150\006\230\024
\226\207\322\141\066\274\155\047\126\236\127\356\300\300\126\375
\062\317\244\331\216\302\043\327\215\250\363\330\045\254\227\344
\160\070\364\266\072\264\235\073\227\046\103\243\241\274\111\131
\162\114\043\060\207\001\130\366\116\276\034\150\126\146\257\315
\101\135\310\263\115\052\125\106\253\037\332\036\342\100\075\333
\315\175\271\222\200\234\067\335\014\226\144\235\334\042\367\144
\213\337\141\336\025\224\122\025\240\175\122\311\113\250\041\311
\306\261\355\313\303\225\140\321\017\360\253\160\370\337\313\115
\176\354\326\372\253\331\275\177\124\362\245\351\171\372\331\326
\166\044\050\163\002\003\001\000\001\243\077\060\075\060\035\006
\003\125\035\016\004\026\004\024\240\163\111\231\150\334\205\133
\145\343\233\050\057\127\237\275\063\274\007\110\060\013\006\003
\125\035\017\004\004\003\002\001\006\060\017\006\003\125\035\023
\001\001\377\004\005\060\003\001\001\377\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\150\100
\251\250\273\344\117\135\171\263\005\265\027\263\140\023\353\306
\222\135\340\321\323\152\376\373\276\233\155\277\307\005\155\131
\040\304\034\360\267\332\204\130\002\143\372\110\026\357\117\245
\013\367\112\230\362\077\236\033\255\107\153\143\316\010\107\353
\122\077\170\234\257\115\256\370\325\117\317\232\230\052\020\101

```
\071\122\304\335\331\233\016\357\223\001\256\262\056\312\150\102
\044\102\154\260\263\072\076\315\351\332\110\304\025\313\351\371
\007\017\222\120\111\212\335\061\227\137\311\351\067\252\073\131
\145\227\224\062\311\263\237\076\072\142\130\305\111\255\142\016
\161\245\062\252\057\306\211\166\103\100\023\023\147\075\242\124
\045\020\313\361\072\362\331\372\333\111\126\273\246\376\247\101
\065\303\340\210\141\311\210\307\337\066\020\042\230\131\352\260
\112\373\126\026\163\156\254\115\367\042\241\117\255\035\172\055
\105\047\345\060\301\136\362\332\023\313\045\102\121\225\107\003
\214\154\041\314\164\102\355\123\377\063\213\217\017\127\001\026
\057\317\246\356\311\160\042\024\275\375\276\154\013\003
END
```

```
#
```

```
Trust for Certificate "Security Communication Root CA"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "Security
Communication Root CA"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\066\261\053\111\371\201\236\327\114\236\274\070\017\306\126\217
\135\254\262\367
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

```
\361\274\143\152\124\340\265\047\365\315\347\032\343\115\156\112
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\120\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\030\060\026\006\003\125\004\012\023\017\123\105\103\117\115\040
\124\162\165\163\164\056\156\145\164\061\047\060\045\006\003\125
\004\013\023\036\123\145\143\165\162\151\164\171\040\103\157\155
\155\165\156\151\143\141\164\151\157\156\040\122\157\157\164\103
\101\061
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

```
\002\001\000
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "Sonera Class 1 Root CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Sonera Class 1 Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061
\017\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141
\061\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162
\141\040\103\154\141\163\163\061\040\103\101
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061
\017\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141
\061\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162
\141\040\103\154\141\163\163\061\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\044
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\040\060\202\002\010\240\003\002\001\002\002\001\044
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061\017
\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141\061
\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162\141
\040\103\154\141\163\163\061\040\103\101\060\036\027\015\060\061
\060\064\060\066\061\060\064\071\061\063\132\027\015\062\061\060
\064\060\066\061\060\064\071\061\063\132\060\071\061\013\060\011
\006\003\125\004\006\023\002\106\111\061\017\060\015\006\003\125
\004\012\023\006\123\157\156\145\162\141\061\031\060\027\006\003
\125\004\003\023\020\123\157\156\145\162\141\040\103\154\141\163
\163\061\040\103\101\060\202\001\042\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001
\012\002\202\001\001\000\265\211\037\053\117\147\012\171\377\305
\036\370\177\074\355\321\176\332\260\315\155\057\066\254\064\306
\333\331\144\027\010\143\060\063\042\212\114\356\216\273\017\015
\102\125\311\235\056\245\357\367\247\214\303\253\271\227\313\216
\357\077\025\147\250\202\162\143\123\017\101\214\175\020\225\044
\241\132\245\006\372\222\127\235\372\245\001\362\165\351\037\274
\126\046\122\116\170\031\145\130\125\003\130\300\024\256\214\174
\125\137\160\133\167\043\006\066\227\363\044\265\232\106\225\344
\337\015\013\005\105\345\321\362\035\202\273\306\023\340\376\252
\172\375\151\060\224\363\322\105\205\374\362\062\133\062\336\350
\154\135\037\313\244\042\164\260\200\216\135\224\367\006\000\113
\251\324\136\056\065\120\011\363\200\227\364\014\027\256\071\330
```

\137\315\063\301\034\312\211\302\042\367\105\022\355\136\022\223
\235\143\253\202\056\271\353\102\101\104\313\112\032\000\202\015
\236\371\213\127\076\114\307\027\355\054\213\162\063\137\162\172
\070\126\325\346\331\256\005\032\035\165\105\261\313\245\045\034
\022\127\066\375\042\067\002\003\001\000\001\243\063\060\061\060
\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377
\060\021\006\003\125\035\016\004\012\004\010\107\342\014\213\366
\123\210\122\060\013\006\003\125\035\017\004\004\003\002\001\006
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\213\032\262\311\135\141\264\341\271\053\271\123
\321\262\205\235\167\216\026\356\021\075\333\302\143\331\133\227
\145\373\022\147\330\052\134\266\253\345\136\303\267\026\057\310
\350\253\035\212\375\253\032\174\325\137\143\317\334\260\335\167
\271\250\346\322\042\070\207\007\024\331\377\276\126\265\375\007
\016\074\125\312\026\314\247\246\167\067\373\333\134\037\116\131
\006\207\243\003\103\365\026\253\267\204\275\116\357\237\061\067
\360\106\361\100\266\321\014\245\144\370\143\136\041\333\125\116
\117\061\166\234\020\141\216\266\123\072\243\021\276\257\155\174
\036\275\256\055\342\014\151\307\205\123\150\242\141\272\305\076
\264\171\124\170\236\012\307\002\276\142\321\021\202\113\145\057
\221\132\302\250\207\261\126\150\224\171\371\045\367\301\325\256
\032\270\273\075\217\251\212\070\025\367\163\320\132\140\321\200
\260\360\334\325\120\315\116\356\222\110\151\355\262\043\036\060
\314\310\224\310\266\365\073\206\177\077\246\056\237\366\076\054
\265\222\226\076\337\054\223\212\377\201\214\017\017\131\041\031
\127\275\125\232

END

#

Trust for Certificate "Sonera Class 1 Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Sonera Class 1 Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\007\107\042\001\231\316\164\271\174\260\075\171\262\144\242\310
\125\351\063\377

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\063\267\204\365\137\047\327\150\047\336\024\336\022\052\355\157

END

CKA_ISSUER MULTILINE_OCTAL

\060\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061
\017\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141
\061\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162
\141\040\103\154\141\163\163\061\040\103\101

END

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\044
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST
CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "Sonera Class 2 Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Sonera Class 2 Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061
\017\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141
\061\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162
\141\040\103\154\141\163\163\062\040\103\101
END
```

```
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061
\017\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141
\061\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162
\141\040\103\154\141\163\163\062\040\103\101
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\035
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\040\060\202\002\010\240\003\002\001\002\002\001\035
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061\017
\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141\061
\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162\141
\040\103\154\141\163\163\062\040\103\101\060\036\027\015\060\061
\060\064\060\066\060\067\062\071\064\060\132\027\015\062\061\060
\064\060\066\060\067\062\071\064\060\132\060\071\061\013\060\011
\006\003\125\004\006\023\002\106\111\061\017\060\015\006\003\125
\004\012\023\006\123\157\156\145\162\141\061\031\060\027\006\003
\125\004\003\023\020\123\157\156\145\162\141\040\103\154\141\163
\163\062\040\103\101\060\202\001\042\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001
```

\012\002\202\001\001\000\220\027\112\065\235\312\360\015\226\307
\104\372\026\067\374\110\275\275\177\200\055\065\073\341\157\250
\147\251\277\003\034\115\214\157\062\107\325\101\150\244\023\004
\301\065\014\232\204\103\374\134\035\377\211\263\350\027\030\315
\221\137\373\211\343\352\277\116\135\174\033\046\323\165\171\355
\346\204\343\127\345\255\051\304\364\072\050\347\245\173\204\066
\151\263\375\136\166\275\243\055\231\323\220\116\043\050\175\030
\143\361\124\073\046\235\166\133\227\102\262\377\256\360\116\354
\335\071\225\116\203\006\177\347\111\100\310\305\001\262\124\132
\146\035\075\374\371\351\074\012\236\201\270\160\360\001\213\344
\043\124\174\310\256\370\220\036\000\226\162\324\124\317\141\043
\274\352\373\235\002\225\321\266\271\161\072\151\010\077\017\264
\341\102\307\210\365\077\230\250\247\272\034\340\161\161\357\130
\127\201\120\172\134\153\164\106\016\203\003\230\303\216\250\156
\362\166\062\156\047\203\302\163\363\334\030\350\264\223\352\165
\104\153\004\140\040\161\127\207\235\363\276\240\220\043\075\212
\044\341\332\041\333\303\002\003\001\000\001\243\063\060\061\060
\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377
\060\021\006\003\125\035\016\004\012\004\010\112\240\252\130\204
\323\136\074\060\013\006\003\125\035\017\004\004\003\002\001\006
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\132\316\207\371\026\162\025\127\113\035\331\233
\347\242\046\060\354\223\147\337\326\055\322\064\257\367\070\245
\316\253\026\271\253\057\174\065\313\254\320\017\264\114\053\374
\200\357\153\214\221\137\066\166\367\333\263\033\031\352\364\262
\021\375\141\161\104\277\050\263\072\035\277\263\103\350\237\277
\334\061\010\161\260\235\215\326\064\107\062\220\306\145\044\367
\240\112\174\004\163\217\071\157\027\214\162\265\275\113\310\172
\370\173\203\303\050\116\234\011\352\147\077\262\147\004\033\303
\024\332\370\347\111\044\221\320\035\152\372\141\071\357\153\347
\041\165\006\007\330\022\264\041\040\160\102\161\201\332\074\232
\066\276\246\133\015\152\154\232\037\221\173\371\371\357\102\272
\116\116\236\314\014\215\224\334\331\105\234\136\354\102\120\143
\256\364\135\304\261\022\334\312\073\250\056\235\024\132\005\165
\267\354\327\143\342\272\065\266\004\010\221\350\332\235\234\366
\146\265\030\254\012\246\124\046\064\063\322\033\301\324\177\032
\072\216\013\252\062\156\333\374\117\045\237\331\062\307\226\132
\160\254\337\114

END

#

Trust for Certificate "Sonera Class 2 Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Sonera Class 2 Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\067\367\155\346\007\174\220\305\261\076\223\032\267\101\020\264
\362\344\232\047

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\243\354\165\017\056\210\337\372\110\001\116\013\134\110\157\373

END

CKA_ISSUER MULTILINE_OCTAL

\060\071\061\013\060\011\006\003\125\004\006\023\002\106\111\061
\017\060\015\006\003\125\004\012\023\006\123\157\156\145\162\141
\061\031\060\027\006\003\125\004\003\023\020\123\157\156\145\162
\141\040\103\154\141\163\163\062\040\103\101

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\035

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Staat der Nederlanden Root CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Staat der Nederlanden Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\125\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\023\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\046\060\044\006\003\125\004\003\023\035\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\125\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\023\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\046\060\044\006\003\125\004\003\023\035\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\004\000\230\226\212

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\272\060\202\002\242\240\003\002\001\002\002\004\000
\230\226\212\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\125\061\013\060\011\006\003\125\004\006\023\002\116
\114\061\036\060\034\006\003\125\004\012\023\025\123\164\141\141
\164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145
\156\061\046\060\044\006\003\125\004\003\023\035\123\164\141\141
\164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145
\156\040\122\157\157\164\040\103\101\060\036\027\015\060\062\061
\062\061\067\060\071\062\063\064\071\132\027\015\061\065\061\062
\061\066\060\071\061\065\063\070\132\060\125\061\013\060\011\006
\003\125\004\006\023\002\116\114\061\036\060\034\006\003\125\004
\012\023\025\123\164\141\141\164\040\144\145\162\040\116\145\144
\145\162\154\141\156\144\145\156\061\046\060\044\006\003\125\004
\003\023\035\123\164\141\141\164\040\144\145\162\040\116\145\144
\145\162\154\141\156\144\145\156\040\122\157\157\164\040\103\101
\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001
\000\230\322\265\121\021\172\201\246\024\230\161\155\276\314\347
\023\033\326\047\016\172\263\152\030\034\266\141\132\325\141\011
\277\336\220\023\307\147\356\335\363\332\305\014\022\236\065\125
\076\054\047\210\100\153\367\334\335\042\141\365\302\307\016\365
\366\325\166\123\115\217\214\274\030\166\067\205\235\350\312\111
\307\322\117\230\023\011\242\076\042\210\234\177\326\362\020\145
\264\356\137\030\325\027\343\370\305\375\342\235\242\357\123\016
\205\167\242\017\341\060\107\356\000\347\063\175\104\147\032\013
\121\350\213\240\236\120\230\150\064\122\037\056\155\001\362\140
\105\362\061\353\251\061\150\051\273\172\101\236\306\031\177\224
\264\121\071\003\177\262\336\247\062\233\264\107\216\157\264\112
\256\345\257\261\334\260\033\141\274\231\162\336\344\211\267\172
\046\135\332\063\111\133\122\234\016\365\212\255\303\270\075\350
\006\152\302\325\052\013\154\173\204\275\126\005\313\206\145\222
\354\104\053\260\216\271\334\160\013\106\332\255\274\143\210\071
\372\333\152\376\043\372\274\344\110\364\147\053\152\021\020\041
\111\002\003\001\000\001\243\201\221\060\201\216\060\014\006\003
\125\035\023\004\005\060\003\001\001\377\060\117\006\003\125\035
\040\004\110\060\106\060\104\006\004\125\035\040\000\060\074\060
\072\006\010\053\006\001\005\005\007\002\001\026\056\150\164\164
\160\072\057\057\167\167\167\056\160\153\151\157\166\145\162\150
\145\151\144\056\156\154\057\160\157\154\151\143\151\145\163\057
\162\157\157\164\055\160\157\154\151\143\171\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125
\035\016\004\026\004\024\250\175\353\274\143\244\164\023\164\000
\354\226\340\323\064\301\054\277\154\370\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\005\204

```
\207\125\164\066\141\301\273\321\324\306\025\250\023\264\237\244
\376\273\356\025\264\057\006\014\051\362\250\222\244\141\015\374
\253\134\010\133\121\023\053\115\302\052\141\310\370\011\130\374
\055\002\262\071\175\231\146\201\277\156\134\225\105\040\154\346
\171\247\321\330\034\051\374\302\040\047\121\310\361\174\135\064
\147\151\205\021\060\306\000\322\327\363\323\174\266\360\061\127
\050\022\202\163\351\063\057\246\125\264\013\221\224\107\234\372
\273\172\102\062\350\256\176\055\310\274\254\024\277\331\017\331
\133\374\301\371\172\225\341\175\176\226\374\161\260\302\114\310
\337\105\064\311\316\015\362\234\144\010\320\073\303\051\305\262
\355\220\004\301\261\051\221\305\060\157\301\251\162\063\314\376
\135\026\027\054\021\151\347\176\376\305\203\010\337\274\334\042
\072\056\040\151\043\071\126\140\147\220\213\056\166\071\373\021
\210\227\366\174\275\113\270\040\026\147\005\215\342\073\301\162
\077\224\225\067\307\135\271\236\330\223\241\027\217\377\014\146
\025\301\044\174\062\174\003\035\073\241\130\105\062\223
END
```

#

```
Trust for Certificate "Staat der Nederlanden Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Staat der Nederlanden Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\020\035\372\077\325\013\313\273\233\265\140\014\031\125\244\032
\364\163\072\004
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\140\204\174\132\316\333\014\324\313\247\351\376\002\306\251\300
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\125\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\023\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\046\060\044\006\003\125\004\003\023\035\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\000\230\226\212
```

END

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```

#
# Certificate "TDC Internet Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TDC Internet Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\103\061\013\060\011\006\003\125\004\006\023\002\104\113\061
\025\060\023\006\003\125\004\012\023\014\124\104\103\040\111\156
\164\145\162\156\145\164\061\035\060\033\006\003\125\004\013\023
\024\124\104\103\040\111\156\164\145\162\156\145\164\040\122\157
\157\164\040\103\101
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\103\061\013\060\011\006\003\125\004\006\023\002\104\113\061
\025\060\023\006\003\125\004\012\023\014\124\104\103\040\111\156
\164\145\162\156\145\164\061\035\060\033\006\003\125\004\013\023
\024\124\104\103\040\111\156\164\145\162\156\145\164\040\122\157
\157\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\072\314\245\114
END
CKA_VALUE MULTILINE_OCTAL
\060\202\004\053\060\202\003\023\240\003\002\001\002\002\004\072
\314\245\114\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\103\061\013\060\011\006\003\125\004\006\023\002\104
\113\061\025\060\023\006\003\125\004\012\023\014\124\104\103\040
\111\156\164\145\162\156\145\164\061\035\060\033\006\003\125\004
\013\023\024\124\104\103\040\111\156\164\145\162\156\145\164\040
\122\157\157\164\040\103\101\060\036\027\015\060\061\060\064\060
\065\061\066\063\063\061\067\132\027\015\062\061\060\064\060\065
\061\067\060\063\061\067\132\060\103\061\013\060\011\006\003\125
\004\006\023\002\104\113\061\025\060\023\006\003\125\004\012\023
\014\124\104\103\040\111\156\164\145\162\156\145\164\061\035\060
\033\006\003\125\004\013\023\024\124\104\103\040\111\156\164\145
\162\156\145\164\040\122\157\157\164\040\103\101\060\202\001\042
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\202\001\017\000\060\202\001\012\002\202\001\001\000\304\270\100
\274\221\325\143\037\327\231\240\213\014\100\036\164\267\110\235
\106\214\002\262\340\044\137\360\031\023\247\067\203\153\135\307
\216\371\204\060\316\032\073\372\373\316\213\155\043\306\303\156

```

\146\237\211\245\337\340\102\120\147\372\037\154\036\364\320\005
\326\277\312\326\116\344\150\140\154\106\252\034\135\143\341\007
\206\016\145\000\247\056\246\161\306\274\271\201\250\072\175\032
\322\371\321\254\113\313\316\165\257\334\173\372\201\163\324\374
\272\275\101\210\324\164\263\371\136\070\072\074\103\250\322\225
\116\167\155\023\014\235\217\170\001\267\132\040\037\003\067\065
\342\054\333\113\053\054\170\271\111\333\304\320\307\234\234\344
\212\040\011\041\026\126\146\377\005\354\133\343\360\317\253\044
\044\136\303\177\160\172\022\304\322\265\020\240\266\041\341\215
\170\151\125\104\151\365\312\226\034\064\205\027\045\167\342\366
\057\047\230\170\375\171\006\072\242\326\132\103\301\377\354\004
\073\356\023\357\323\130\132\377\222\353\354\256\332\362\067\003
\107\101\266\227\311\055\012\101\042\273\273\346\247\002\003\001
\000\001\243\202\001\045\060\202\001\041\060\021\006\011\140\206
\110\001\206\370\102\001\001\004\004\003\002\000\007\060\145\006
\003\125\035\037\004\136\060\134\060\132\240\130\240\126\244\124
\060\122\061\013\060\011\006\003\125\004\006\023\002\104\113\061
\025\060\023\006\003\125\004\012\023\014\124\104\103\040\111\156
\164\145\162\156\145\164\061\035\060\033\006\003\125\004\013\023
\024\124\104\103\040\111\156\164\145\162\156\145\164\040\122\157
\157\164\040\103\101\061\015\060\013\006\003\125\004\003\023\004
\103\122\114\061\060\053\006\003\125\035\020\004\044\060\042\200
\017\062\060\060\061\060\064\060\065\061\066\063\063\061\067\132
\201\017\062\060\062\061\060\064\060\065\061\067\060\063\061\067
\132\060\013\006\003\125\035\017\004\004\003\002\001\006\060\037
\006\003\125\035\043\004\030\060\026\200\024\154\144\001\307\375
\205\155\254\310\332\236\120\010\205\010\265\074\126\250\120\060
\035\006\003\125\035\016\004\026\004\024\154\144\001\307\375\205
\155\254\310\332\236\120\010\205\010\265\074\126\250\120\060\014
\006\003\125\035\023\004\005\060\003\001\001\377\060\035\006\011
\052\206\110\206\366\175\007\101\000\004\020\060\016\033\010\126
\065\056\060\072\064\056\060\003\002\004\220\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000\116
\103\314\321\335\035\020\033\006\177\267\244\372\323\331\115\373
\043\237\043\124\133\346\213\057\004\050\213\265\047\155\211\241
\354\230\151\334\347\215\046\203\005\171\164\354\264\271\243\227
\301\065\000\375\025\332\071\201\072\225\061\220\336\227\351\206
\250\231\167\014\345\132\240\204\377\022\026\254\156\270\215\303
\173\222\302\254\056\320\175\050\354\266\363\140\070\151\157\076
\330\004\125\076\236\314\125\322\272\376\273\107\004\327\012\331
\026\012\064\051\365\130\023\325\117\317\217\126\113\263\036\356
\323\230\171\332\010\036\014\157\270\370\026\047\357\302\157\075
\366\243\113\076\016\344\155\154\333\073\101\022\233\275\015\107
\043\177\074\112\320\257\300\257\366\357\033\265\025\304\353\203
\304\011\137\164\213\331\021\373\302\126\261\074\370\160\312\064
\215\103\100\023\214\375\231\003\124\171\306\056\352\206\241\366
\072\324\011\274\364\274\146\314\075\130\320\127\111\012\356\045
\342\101\356\023\371\233\070\064\321\000\365\176\347\224\035\374

\151\003\142\270\231\005\005\075\153\170\022\275\260\157\145

END

#

Trust for Certificate "TDC Internet Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL

UTF8 "TDC Internet Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\041\374\275\216\177\154\257\005\033\321\263\103\354\250\347\141

\107\362\017\212

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\221\364\003\125\040\241\370\143\054\142\336\254\373\141\034\216

END

CKA_ISSUER MULTILINE_OCTAL

\060\103\061\013\060\011\006\003\125\004\006\023\002\104\113\061

\025\060\023\006\003\125\004\012\023\014\124\104\103\040\111\156

\164\145\162\156\145\164\061\035\060\033\006\003\125\004\013\023

\024\124\104\103\040\111\156\164\145\162\156\145\164\040\122\157

\157\164\040\103\101

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\004\072\314\245\114

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "TDC OCES Root CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE

CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "TDC OCES Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\061\061\013\060\011\006\003\125\004\006\023\002\104\113\061

\014\060\012\006\003\125\004\012\023\003\124\104\103\061\024\060

\022\006\003\125\004\003\023\013\124\104\103\040\117\103\105\123

\040\103\101

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\061\061\013\060\011\006\003\125\004\006\023\002\104\113\061
\014\060\012\006\003\125\004\012\023\003\124\104\103\061\024\060
\022\006\003\125\004\003\023\013\124\104\103\040\117\103\105\123
\040\103\101

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\004\076\110\275\304

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\031\060\202\004\001\240\003\002\001\002\002\004\076
\110\275\304\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\061\061\013\060\011\006\003\125\004\006\023\002\104
\113\061\014\060\012\006\003\125\004\012\023\003\124\104\103\061
\024\060\022\006\003\125\004\003\023\013\124\104\103\040\117\103
\105\123\040\103\101\060\036\027\015\060\063\060\062\061\061\060
\070\063\071\063\060\132\027\015\063\067\060\062\061\061\060\071
\060\071\063\060\132\060\061\061\013\060\011\006\003\125\004\006
\023\002\104\113\061\014\060\012\006\003\125\004\012\023\003\124
\104\103\061\024\060\022\006\003\125\004\003\023\013\124\104\103
\040\117\103\105\123\040\103\101\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\254\142\366\141\040\262\317
\300\306\205\327\343\171\346\314\355\362\071\222\244\227\056\144
\243\204\133\207\234\114\375\244\363\304\137\041\275\126\020\353
\333\056\141\354\223\151\343\243\314\275\231\303\005\374\006\270
\312\066\034\376\220\216\111\114\304\126\232\057\126\274\317\173
\014\361\157\107\246\015\103\115\342\351\035\071\064\315\215\054
\331\022\230\371\343\341\301\112\174\206\070\304\251\304\141\210
\322\136\257\032\046\115\325\344\240\042\107\204\331\144\267\031
\226\374\354\031\344\262\227\046\116\112\114\313\217\044\213\124
\030\034\110\141\173\325\210\150\332\135\265\352\315\032\060\301
\200\203\166\120\252\117\321\324\335\070\360\357\026\364\341\014
\120\006\277\352\373\172\111\241\050\053\034\366\374\025\062\243
\164\152\217\251\303\142\051\161\061\345\073\244\140\027\136\164
\346\332\023\355\351\037\037\033\321\262\150\163\306\020\064\165
\106\020\020\343\220\000\166\100\313\213\267\103\011\041\377\253
\116\223\306\130\351\245\202\333\167\304\072\231\261\162\225\111
\004\360\267\053\372\173\131\216\335\002\003\001\000\001\243\202
\002\067\060\202\002\063\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\016\006\003\125\035\017\001\001
\377\004\004\003\002\001\006\060\201\354\006\003\125\035\040\004
\201\344\060\201\341\060\201\336\006\010\052\201\120\201\051\001
\001\001\060\201\321\060\057\006\010\053\006\001\005\005\007\002
\001\026\043\150\164\164\160\072\057\057\167\167\167\056\143\145
\162\164\151\146\151\153\141\164\056\144\153\057\162\145\160\157

\163\151\164\157\162\171\060\201\235\006\010\053\006\001\005\005
\007\002\002\060\201\220\060\012\026\003\124\104\103\060\003\002
\001\001\032\201\201\103\145\162\164\151\146\151\153\141\164\145
\162\040\146\162\141\040\144\145\156\156\145\040\103\101\040\165
\144\163\164\145\144\145\163\040\165\156\144\145\162\040\117\111
\104\040\061\056\062\056\062\060\070\056\061\066\071\056\061\056
\061\056\061\056\040\103\145\162\164\151\146\151\143\141\164\145
\163\040\146\162\157\155\040\164\150\151\163\040\103\101\040\141
\162\145\040\151\163\163\165\145\144\040\165\156\144\145\162\040
\117\111\104\040\061\056\062\056\062\060\070\056\061\066\071\056
\061\056\061\056\061\056\060\021\006\011\140\206\110\001\206\370
\102\001\001\004\004\003\002\000\007\060\201\201\006\003\125\035
\037\004\172\060\170\060\110\240\106\240\104\244\102\060\100\061
\013\060\011\006\003\125\004\006\023\002\104\113\061\014\060\012
\006\003\125\004\012\023\003\124\104\103\061\024\060\022\006\003
\125\004\003\023\013\124\104\103\040\117\103\105\123\040\103\101
\061\015\060\013\006\003\125\004\003\023\004\103\122\114\061\060
\054\240\052\240\050\206\046\150\164\164\160\072\057\057\143\162
\154\056\157\143\145\163\056\143\145\162\164\151\146\151\153\141
\164\056\144\153\057\157\143\145\163\056\143\162\154\060\053\006
\003\125\035\020\004\044\060\042\200\017\062\060\060\063\060\062
\061\061\060\070\063\071\063\060\132\201\017\062\060\063\067\060
\062\061\061\060\071\060\071\063\060\132\060\037\006\003\125\035
\043\004\030\060\026\200\024\140\265\205\354\126\144\176\022\031
\047\147\035\120\025\113\163\256\073\371\022\060\035\006\003\125
\035\016\004\026\004\024\140\265\205\354\126\144\176\022\031\047
\147\035\120\025\113\163\256\073\371\022\060\035\006\011\052\206
\110\206\366\175\007\101\000\004\020\060\016\033\010\126\066\056
\060\072\064\056\060\003\002\004\220\060\015\006\011\052\206\110
\206\367\015\001\001\005\005\000\003\202\001\001\000\012\272\046
\046\106\323\163\250\011\363\153\013\060\231\375\212\341\127\172
\021\323\270\224\327\011\020\156\243\261\070\003\321\266\362\103
\101\051\142\247\162\330\373\174\005\346\061\160\047\124\030\116
\212\174\116\345\321\312\214\170\210\317\033\323\220\213\346\043
\370\013\016\063\103\175\234\342\012\031\217\311\001\076\164\135
\164\311\213\034\003\345\030\310\001\114\077\313\227\005\135\230
\161\246\230\157\266\174\275\067\177\276\341\223\045\155\157\360
\012\255\027\030\341\003\274\007\051\310\255\046\350\370\141\360
\375\041\011\176\232\216\251\150\175\110\142\162\275\000\352\001
\231\270\006\202\121\201\116\361\365\264\221\124\271\043\172\000
\232\237\135\215\340\074\144\271\032\022\222\052\307\202\104\162
\071\334\342\074\306\330\125\365\025\116\310\005\016\333\306\320
\142\246\354\025\264\265\002\202\333\254\214\242\201\360\233\231
\061\365\040\040\250\210\141\012\007\237\224\374\320\327\033\314
\056\027\363\004\047\166\147\353\124\203\375\244\220\176\006\075
\004\243\103\055\332\374\013\142\352\057\137\142\123

END

```
#
Trust for Certificate "TDC OCES Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TDC OCES Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\207\201\302\132\226\275\302\373\114\145\006\117\371\071\013\046
\004\212\016\001
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\223\177\220\034\355\204\147\027\244\145\137\233\313\060\002\227
END
CKA_ISSUER MULTILINE_OCTAL
\060\061\061\013\060\011\006\003\125\004\006\023\002\104\113\061
\014\060\012\006\003\125\004\012\023\003\124\104\103\061\024\060
\022\006\003\125\004\003\023\013\124\104\103\040\117\103\105\123
\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\076\110\275\304
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
#
Certificate "UTN DATACorp SGC Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN DATACorp SGC Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\223\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\033\060\031\006\003\125
\004\003\023\022\125\124\116\040\055\040\104\101\124\101\103\157
```


\162\160\040\123\107\103

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\223\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\033\060\031\006\003\125
\004\003\023\022\125\124\116\040\055\040\104\101\124\101\103\157
\162\160\040\123\107\103

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\104\276\014\213\120\000\041\264\021\323\052\150\006\251
\255\151

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\136\060\202\003\106\240\003\002\001\002\002\020\104
\276\014\213\120\000\041\264\021\323\052\150\006\251\255\151\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\223\061\013\060\011\006\003\125\004\006\023\002\125\123\061\013
\060\011\006\003\125\004\010\023\002\125\124\061\027\060\025\006
\003\125\004\007\023\016\123\141\154\164\040\114\141\153\145\040
\103\151\164\171\061\036\060\034\006\003\125\004\012\023\025\124
\150\145\040\125\123\105\122\124\122\125\123\124\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\013\023\030\150
\164\164\160\072\057\057\167\167\167\056\165\163\145\162\164\162
\165\163\164\056\143\157\155\061\033\060\031\006\003\125\004\003
\023\022\125\124\116\040\055\040\104\101\124\101\103\157\162\160
\040\123\107\103\060\036\027\015\071\071\060\066\062\064\061\070
\065\067\062\061\132\027\015\061\071\060\066\062\064\061\071\060
\066\063\060\132\060\201\223\061\013\060\011\006\003\125\004\006
\023\002\125\123\061\013\060\011\006\003\125\004\010\023\002\125
\124\061\027\060\025\006\003\125\004\007\023\016\123\141\154\164
\040\114\141\153\145\040\103\151\164\171\061\036\060\034\006\003
\125\004\012\023\025\124\150\145\040\125\123\105\122\124\122\125
\123\124\040\116\145\164\167\157\162\153\061\041\060\037\006\003
\125\004\013\023\030\150\164\164\160\072\057\057\167\167\167\056
\165\163\145\162\164\162\165\163\164\056\143\157\155\061\033\060
\031\006\003\125\004\003\023\022\125\124\116\040\055\040\104\101
\124\101\103\157\162\160\040\123\107\103\060\202\001\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001
\017\000\060\202\001\012\002\202\001\001\000\337\356\130\020\242
\053\156\125\304\216\277\056\106\011\347\340\010\017\056\053\172

\023\224\033\275\366\266\200\216\145\005\223\000\036\274\257\342
\017\216\031\015\022\107\354\254\255\243\372\056\160\370\336\156
\373\126\102\025\236\056\134\357\043\336\041\271\005\166\047\031
\017\117\326\303\234\264\276\224\031\143\362\246\021\012\353\123
\110\234\276\362\051\073\026\350\032\240\114\246\311\364\030\131
\150\300\160\362\123\000\300\136\120\202\245\126\157\066\371\112
\340\104\206\240\115\116\326\107\156\111\112\313\147\327\246\304
\005\271\216\036\364\374\377\315\347\066\340\234\005\154\262\063
\042\025\320\264\340\314\027\300\262\300\364\376\062\077\051\052
\225\173\330\362\247\116\017\124\174\241\015\200\263\011\003\301
\377\134\335\136\232\076\274\256\274\107\212\152\256\161\312\037
\261\052\270\137\102\005\013\354\106\060\321\162\013\312\351\126
\155\365\357\337\170\276\141\272\262\245\256\004\114\274\250\254
\151\025\227\275\357\353\264\214\277\065\370\324\303\321\050\016
\134\072\237\160\030\063\040\167\304\242\257\002\003\001\000\001
\243\201\253\060\201\250\060\013\006\003\125\035\017\004\004\003
\002\001\306\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\123
\062\321\263\317\177\372\340\361\240\135\205\116\222\322\236\105
\035\264\117\060\075\006\003\125\035\037\004\066\060\064\060\062
\240\060\240\056\206\054\150\164\164\160\072\057\057\143\162\154
\056\165\163\145\162\164\162\165\163\164\056\143\157\155\057\125
\124\116\055\104\101\124\101\103\157\162\160\123\107\103\056\143
\162\154\060\052\006\003\125\035\045\004\043\060\041\006\010\053
\006\001\005\005\007\003\001\006\012\053\006\001\004\001\202\067
\012\003\003\006\011\140\206\110\001\206\370\102\004\001\060\015
\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001
\001\000\047\065\227\000\212\213\050\275\306\063\060\036\051\374
\342\367\325\230\324\100\273\140\312\277\253\027\054\011\066\177
\120\372\101\334\256\226\072\012\043\076\211\131\311\243\007\355
\033\067\255\374\174\276\121\111\132\336\072\012\124\010\026\105
\302\231\261\207\315\214\150\340\151\003\351\304\116\230\262\073
\214\026\263\016\240\014\230\120\233\223\251\160\011\310\054\243
\217\337\002\344\340\161\072\361\264\043\162\240\252\001\337\337
\230\076\024\120\240\061\046\275\050\351\132\060\046\165\371\173
\140\034\215\363\315\120\046\155\004\047\232\337\325\015\105\107
\051\153\054\346\166\331\251\051\175\062\335\311\066\074\275\256
\065\361\021\236\035\273\220\077\022\107\116\216\327\176\017\142
\163\035\122\046\070\034\030\111\375\060\164\232\304\345\042\057
\330\300\215\355\221\172\114\000\217\162\177\135\332\335\033\213
\105\153\347\335\151\227\250\305\126\114\017\014\366\237\172\221
\067\366\227\202\340\335\161\151\377\166\077\140\115\074\317\367
\231\371\306\127\364\311\125\071\170\272\054\171\311\246\210\053
\364\010

END

#

```
Trust for Certificate "UTN DATACorp SGC Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN DATACorp SGC Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\130\021\237\016\022\202\207\352\120\375\331\207\105\157\117\170
\334\372\326\324
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\263\245\076\167\041\155\254\112\300\311\373\325\101\075\312\006
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\223\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\033\060\031\006\003\125
\004\003\023\022\125\124\116\040\055\040\104\101\124\101\103\157
\162\160\040\123\107\103
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\104\276\014\213\120\000\041\264\021\323\052\150\006\251
\255\151
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "UTN USERFirst Email Root CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN USERFirst Email Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT
MULTILINE_OCTAL
\060\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
```

\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\066\060\064\006\003\125
\004\003\023\055\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\103\154\151\145\156\164\040\101\165\164\150\145\156\164
\151\143\141\164\151\157\156\040\141\156\144\040\105\155\141\151
\154

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\066\060\064\006\003\125
\004\003\023\055\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\103\154\151\145\156\164\040\101\165\164\150\145\156\164
\151\143\141\164\151\157\156\040\141\156\144\040\105\155\141\151
\154

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\104\276\014\213\120\000\044\264\021\323\066\045\045\147
\311\211

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\242\060\202\003\212\240\003\002\001\002\002\020\104
\276\014\213\120\000\044\264\021\323\066\045\045\147\311\211\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\256\061\013\060\011\006\003\125\004\006\023\002\125\123\061\013
\060\011\006\003\125\004\010\023\002\125\124\061\027\060\025\006
\003\125\004\007\023\016\123\141\154\164\040\114\141\153\145\040
\103\151\164\171\061\036\060\034\006\003\125\004\012\023\025\124
\150\145\040\125\123\105\122\124\122\125\123\124\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\013\023\030\150
\164\164\160\072\057\057\167\167\167\056\165\163\145\162\164\162
\165\163\164\056\143\157\155\061\066\060\064\006\003\125\004\003
\023\055\125\124\116\055\125\123\105\122\106\151\162\163\164\055
\103\154\151\145\156\164\040\101\165\164\150\145\156\164\151\143
\141\164\151\157\156\040\141\156\144\040\105\155\141\151\154\060
\036\027\015\071\071\060\067\060\071\061\067\062\070\065\060\132
\027\015\061\071\060\067\060\071\061\067\063\066\065\070\132\060

\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060\025
\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153\145
\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023\025
\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116\145
\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023\030
\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162\164
\162\165\163\164\056\143\157\155\061\066\060\064\006\003\125\004
\003\023\055\125\124\116\055\125\123\105\122\106\151\162\163\164
\055\103\154\151\145\156\164\040\101\165\164\150\145\156\164\151
\143\141\164\151\157\156\040\141\156\144\040\105\155\141\151\154
\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001
\000\262\071\205\244\362\175\253\101\073\142\106\067\256\315\301
\140\165\274\071\145\371\112\032\107\242\271\314\110\314\152\230
\325\115\065\031\271\244\102\345\316\111\342\212\057\036\174\322
\061\007\307\116\264\203\144\235\056\051\325\242\144\304\205\275
\205\121\065\171\244\116\150\220\173\034\172\244\222\250\027\362
\230\025\362\223\314\311\244\062\225\273\014\117\060\275\230\240
\013\213\345\156\033\242\106\372\170\274\242\157\253\131\136\245
\057\317\312\332\155\252\057\353\254\241\263\152\252\267\056\147
\065\213\171\341\036\151\210\342\346\106\315\240\245\352\276\013
\316\166\072\172\016\233\352\374\332\047\133\075\163\037\042\346
\110\141\306\114\363\151\261\250\056\033\266\324\061\040\054\274
\202\212\216\244\016\245\327\211\103\374\026\132\257\035\161\327
\021\131\332\272\207\015\257\372\363\341\302\360\244\305\147\214
\326\326\124\072\336\012\244\272\003\167\263\145\310\375\036\323
\164\142\252\030\312\150\223\036\241\205\176\365\107\145\313\370
\115\127\050\164\322\064\377\060\266\356\366\142\060\024\214\054
\353\002\003\001\000\001\243\201\271\060\201\266\060\013\006\003
\125\035\017\004\004\003\002\001\306\060\017\006\003\125\035\023
\001\001\377\004\005\060\003\001\001\377\060\035\006\003\125\035
\016\004\026\004\024\211\202\147\175\304\235\046\160\000\113\264
\120\110\174\336\075\256\004\156\175\060\130\006\003\125\035\037
\004\121\060\117\060\115\240\113\240\111\206\107\150\164\164\160
\072\057\057\143\162\154\056\165\163\145\162\164\162\165\163\164
\056\143\157\155\057\125\124\116\055\125\123\105\122\106\151\162
\163\164\055\103\154\151\145\156\164\101\165\164\150\145\156\164
\151\143\141\164\151\157\156\141\156\144\105\155\141\151\154\056
\143\162\154\060\035\006\003\125\035\045\004\026\060\024\006\010
\053\006\001\005\005\007\003\002\006\010\053\006\001\005\005\007
\003\004\060\015\006\011\052\206\110\206\367\015\001\001\005\005
\000\003\202\001\001\000\261\155\141\135\246\032\177\174\253\112
\344\060\374\123\157\045\044\306\312\355\342\061\134\053\016\356
\356\141\125\157\004\076\317\071\336\305\033\111\224\344\353\040
\114\264\346\236\120\056\162\331\215\365\252\243\263\112\332\126
\034\140\227\200\334\202\242\255\112\275\212\053\377\013\011\264
\306\327\040\004\105\344\315\200\001\272\272\053\156\316\252\327

```
\222\376\344\257\353\364\046\035\026\052\177\154\060\225\067\057
\063\022\254\177\335\307\321\021\214\121\230\262\320\243\221\320
\255\366\237\236\203\223\036\035\102\270\106\257\153\146\360\233
\177\352\343\003\002\345\002\121\301\252\325\065\235\162\100\003
\211\272\061\035\305\020\150\122\236\337\242\205\305\134\010\246
\170\346\123\117\261\350\267\323\024\236\223\246\303\144\343\254
\176\161\315\274\237\351\003\033\314\373\351\254\061\301\257\174
\025\164\002\231\303\262\107\246\302\062\141\327\307\157\110\044
\121\047\241\325\207\125\362\173\217\230\075\026\236\356\165\266
\370\320\216\362\363\306\256\050\133\247\360\363\066\027\374\303
\005\323\312\003\112\124
```

END

#

Trust for Certificate "UTN USERFirst Email Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "UTN USERFirst Email Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\261\162\261\245\155\225\371\037\345\002\207\341\115\067\352\152
\104\143\166\212
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\327\064\075\357\035\047\011\050\341\061\002\133\023\053\335\367
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\066\060\064\006\003\125
\004\003\023\055\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\103\154\151\145\156\164\040\101\165\164\150\145\156\164
\151\143\141\164\151\157\156\040\141\156\144\040\105\155\141\151
\154
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\020\104\276\014\213\120\000\044\264\021\323\066\045\045\147
\311\211
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE

#

Certificate "UTN USERFirst Hardware Root CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "UTN USERFirst Hardware Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\227\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\037\060\035\006\003\125
\004\003\023\026\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\110\141\162\144\167\141\162\145

END

CKA_ID UTF8 "0"

CKA_ISSUER

MULTILINE_OCTAL

\060\201\227\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\037\060\035\006\003\125
\004\003\023\026\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\110\141\162\144\167\141\162\145

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\104\276\014\213\120\000\044\264\021\323\066\052\376\145
\012\375

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\164\060\202\003\134\240\003\002\001\002\002\020\104
\276\014\213\120\000\044\264\021\323\066\052\376\145\012\375\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\227\061\013\060\011\006\003\125\004\006\023\002\125\123\061\013

\060\011\006\003\125\004\010\023\002\125\124\061\027\060\025\006
\003\125\004\007\023\016\123\141\154\164\040\114\141\153\145\040
\103\151\164\171\061\036\060\034\006\003\125\004\012\023\025\124
\150\145\040\125\123\105\122\124\122\125\123\124\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\013\023\030\150
\164\164\160\072\057\057\167\167\167\056\165\163\145\162\164\162
\165\163\164\056\143\157\155\061\037\060\035\006\003\125\004\003
\023\026\125\124\116\055\125\123\105\122\106\151\162\163\164\055
\110\141\162\144\167\141\162\145\060\036\027\015\071\071\060\067
\060\071\061\070\061\060\064\062\132\027\015\061\071\060\067\060
\071\061\070\061\071\062\062\132\060\201\227\061\013\060\011\006
\003\125\004\006\023\002\125\123\061\013\060\011\006\003\125\004
\010\023\002\125\124\061\027\060\025\006\003\125\004\007\023\016
\123\141\154\164\040\114\141\153\145\040\103\151\164\171\061\036
\060\034\006\003\125\004\012\023\025\124\150\145\040\125\123\105
\122\124\122\125\123\124\040\116\145\164\167\157\162\153\061\041
\060\037\006\003\125\004\013\023\030\150\164\164\160\072\057\057
\167\167\167\056\165\163\145\162\164\162\165\163\164\056\143\157
\155\061\037\060\035\006\003\125\004\003\023\026\125\124\116\055
\125\123\105\122\106\151\162\163\164\055\110\141\162\144\167\141
\162\145\060\202\001\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202
\001\001\000\261\367\303\070\077\264\250\177\317\071\202\121\147
\320\155\237\322\377\130\363\347\237\053\354\015\211\124\231\271
\070\231\026\367\340\041\171\110\302\273\141\164\022\226\035\074
\152\162\325\074\020\147\072\071\355\053\023\315\146\353\225\011
\063\244\154\227\261\350\306\354\301\165\171\234\106\136\215\253
\320\152\375\271\052\125\027\020\124\263\031\360\232\366\361\261
\135\266\247\155\373\340\161\027\153\242\210\373\000\337\376\032
\061\167\014\232\001\172\261\062\343\053\001\007\070\156\303\245
\136\043\274\105\233\173\120\301\311\060\217\333\345\053\172\323
\133\373\063\100\036\240\325\230\027\274\213\207\303\211\323\135
\240\216\262\252\252\366\216\151\210\006\305\372\211\041\363\010
\235\151\056\011\063\233\051\015\106\017\214\314\111\064\260\151
\121\275\371\006\315\150\255\146\114\274\076\254\141\275\012\210
\016\310\337\075\356\174\004\114\235\012\136\153\221\326\356\307
\355\050\215\253\115\207\211\163\320\156\244\320\036\026\213\024
\341\166\104\003\177\143\254\344\315\111\234\305\222\364\253\062
\241\110\133\002\003\001\000\001\243\201\271\060\201\266\060\013
\006\003\125\035\017\004\004\003\002\001\306\060\017\006\003\125
\035\023\001\001\377\004\005\060\003\001\001\377\060\035\006\003
\125\035\016\004\026\004\024\241\162\137\046\033\050\230\103\225
\135\007\067\325\205\226\235\113\322\303\105\060\104\006\003\125
\035\037\004\075\060\073\060\071\240\067\240\065\206\063\150\164
\164\160\072\057\057\143\162\154\056\165\163\145\162\164\162\165
\163\164\056\143\157\155\057\125\124\116\055\125\123\105\122\106
\151\162\163\164\055\110\141\162\144\167\141\162\145\056\143\162
\154\060\061\006\003\125\035\045\004\052\060\050\006\010\053\006


```
\001\005\005\007\003\001\006\010\053\006\001\005\005\007\003\005
\006\010\053\006\001\005\005\007\003\006\006\010\053\006\001\005
\005\007\003\007\060\015\006\011\052\206\110\206\367\015\001\001
\005\005\000\003\202\001\001\000\107\031\017\336\164\306\231\227
\257\374\255\050\136\165\216\353\055\147\356\116\173\053\327\014
\377\366\336\313\125\242\012\341\114\124\145\223\140\153\237\022
\234\255\136\203\054\353\132\256\300\344\055\364\000\143\035\270
\300\154\362\317\111\273\115\223\157\006\246\012\042\262\111\142
\010\116\377\310\310\024\262\210\026\135\347\001\344\022\225\345
\105\064\263\213\151\275\317\264\205\217\165\121\236\175\072\070
\072\024\110\022\306\373\247\073\032\215\015\202\100\007\350\004
\010\220\241\211\313\031\120\337\312\034\001\274\035\004\031\173
\020\166\227\073\356\220\220\312\304\016\037\026\156\165\357\063
\370\323\157\133\036\226\343\340\164\167\164\173\212\242\156\055
\335\166\326\071\060\202\360\253\234\122\362\052\307\257\111\136
\176\307\150\345\202\201\310\152\047\371\047\210\052\325\130\120
\225\037\360\073\034\127\273\175\024\071\142\053\232\311\224\222
\052\243\042\014\377\211\046\175\137\043\053\107\327\025\035\251
\152\236\121\015\052\121\236\201\371\324\073\136\160\022\177\020
\062\234\036\273\235\370\146\250
```

END

#

```
Trust for Certificate "UTN USERFirst Hardware Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN USERFirst Hardware Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\004\203\355\063\231\254\066\010\005\207\042\355\274\136\106\000
\343\276\371\327
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\114\126\101\345\015\273\053\350\312\243\355\030\010\255\103\071
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\227\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\037\060\035\006\003\125
\004\003\023\026\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\110\141\162\144\167\141\162\145
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\104\276\014\213\120\000\044\264\021\323\066\052\376\145
\012\375
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "UTN USERFirst Object Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN USERFirst Object Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\225\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\035\060\033\006\003\125
\004\003\023\024\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\117\142\152\145\143\164
END
```

```
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\225\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\035\060\033\006\003\125
\004\003\023\024\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\117\142\152\145\143\164
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\104\276\014\213\120\000\044\264\021\323\066\055\340\263
```

\137\033

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\146\060\202\003\116\240\003\002\001\002\002\020\104
\276\014\213\120\000\044\264\021\323\066\055\340\263\137\033\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\225\061\013\060\011\006\003\125\004\006\023\002\125\123\061\013
\060\011\006\003\125\004\010\023\002\125\124\061\027\060\025\006
\003\125\004\007\023\016\123\141\154\164\040\114\141\153\145\040
\103\151\164\171\061\036\060\034\006\003\125\004\012\023\025\124
\150\145\040\125\123\105\122\124\122\125\123\124\040\116\145\164
\167\157\162\153\061\041\060\037\006\003\125\004\013\023\030\150
\164\164\160\072\057\057\167\167\167\056\165\163\145\162\164\162
\165\163\164\056\143\157\155\061\035\060\033\006\003\125\004\003
\023\024\125\124\116\055\125\123\105\122\106\151\162\163\164\055
\117\142\152\145\143\164\060\036\027\015\071\071\060\067\060\071
\061\070\063\061\062\060\132\027\015\061\071\060\067\060\071\061
\070\064\060\063\066\132\060\201\225\061\013\060\011\006\003\125
\004\006\023\002\125\123\061\013\060\011\006\003\125\004\010\023
\002\125\124\061\027\060\025\006\003\125\004\007\023\016\123\141
\154\164\040\114\141\153\145\040\103\151\164\171\061\036\060\034
\006\003\125\004\012\023\025\124\150\145\040\125\123\105\122\124
\122\125\123\124\040\116\145\164\167\157\162\153\061\041\060\037
\006\003\125\004\013\023\030\150\164\164\160\072\057\057\167\167
\167\056\165\163\145\162\164\162\165\163\164\056\143\157\155\061
\035\060\033\006\003\125\004\003\023\024\125\124\116\055\125\123
\105\122\106\151\162\163\164\055\117\142\152\145\143\164\060\202
\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000\316
\252\201\077\243\243\141\170\252\061\000\125\225\021\236\047\017
\037\034\337\072\233\202\150\060\300\112\141\035\361\057\016\372
\276\171\367\245\043\357\125\121\226\204\315\333\343\271\156\076
\061\330\012\040\147\307\364\331\277\224\353\107\004\076\002\316
\052\242\135\207\004\011\366\060\235\030\212\227\262\252\034\374
\101\322\241\066\313\373\075\221\272\347\331\160\065\372\344\347
\220\303\233\243\233\323\074\365\022\231\167\261\267\011\340\150
\346\034\270\363\224\143\210\152\152\376\013\166\311\276\364\042
\344\147\271\253\032\136\167\301\205\007\335\015\154\277\356\006
\307\167\152\101\236\247\017\327\373\356\224\027\267\374\205\276
\244\253\304\034\061\335\327\266\321\344\360\357\337\026\217\262
\122\223\327\241\324\211\241\007\056\277\341\001\022\102\036\032
\341\330\225\064\333\144\171\050\377\272\056\021\302\345\350\133
\222\110\373\107\013\302\154\332\255\062\203\101\363\245\345\101
\160\375\145\220\155\372\372\121\304\371\275\226\053\031\004\054
\323\155\247\334\360\177\157\203\145\342\152\253\207\206\165\002
\003\001\000\001\243\201\257\060\201\254\060\013\006\003\125\035
\017\004\004\003\002\001\306\060\017\006\003\125\035\023\001\001
\377\004\005\060\003\001\001\377\060\035\006\003\125\035\016\004

\026\004\024\332\355\144\164\024\234\024\074\253\335\231\251\275
\133\050\115\213\074\311\330\060\102\006\003\125\035\037\004\073
\060\071\060\067\240\065\240\063\206\061\150\164\164\160\072\057
\057\143\162\154\056\165\163\145\162\164\162\165\163\164\056\143
\157\155\057\125\124\116\055\125\123\105\122\106\151\162\163\164
\055\117\142\152\145\143\164\056\143\162\154\060\051\006\003\125
\035\045\004\042\060\040\006\010\053\006\001\005\005\007\003\003
\006\010\053\006\001\005\005\007\003\010\006\012\053\006\001\004
\001\202\067\012\003\004\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\001\001\000\010\037\122\261\067\104
\170\333\375\316\271\332\225\226\230\252\125\144\200\265\132\100
\335\041\245\305\301\363\137\054\114\310\107\132\151\352\350\360
\065\065\364\320\045\363\310\246\244\207\112\275\033\261\163\010
\275\324\303\312\266\065\273\131\206\167\061\315\247\200\024\256
\023\357\374\261\110\371\153\045\045\055\121\266\054\155\105\301
\230\310\212\126\135\076\356\103\116\076\153\047\216\320\072\113
\205\013\137\323\355\152\247\165\313\321\132\207\057\071\165\023
\132\162\260\002\201\237\276\360\017\204\124\040\142\154\151\324
\341\115\306\015\231\103\001\015\022\226\214\170\235\277\120\242
\261\104\252\152\317\027\172\317\157\017\324\370\044\125\137\360
\064\026\111\146\076\120\106\311\143\161\070\061\142\270\142\271
\363\123\255\154\265\053\242\022\252\031\117\011\332\136\347\223
\306\216\024\010\376\360\060\200\030\240\206\205\115\310\175\327
\213\003\376\156\325\367\235\026\254\222\054\240\043\345\234\221
\122\037\224\337\027\224\163\303\263\301\301\161\005\040\000\170
\275\023\122\035\250\076\315\000\037\310

END

#

Trust for Certificate "UTN USERFirst Object Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "UTN USERFirst Object Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\341\055\373\113\101\327\331\303\053\060\121\113\254\035\201\330
\070\136\055\106

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL
\247\362\344\026\006\101\021\120\060\153\234\343\264\234\260\311
END

CKA_ISSUER MULTILINE_OCTAL
\060\201\225\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\013\060\011\006\003\125\004\010\023\002\125\124\061\027\060
\025\006\003\125\004\007\023\016\123\141\154\164\040\114\141\153
\145\040\103\151\164\171\061\036\060\034\006\003\125\004\012\023
\025\124\150\145\040\125\123\105\122\124\122\125\123\124\040\116

```
\145\164\167\157\162\153\061\041\060\037\006\003\125\004\013\023
\030\150\164\164\160\072\057\057\167\167\167\056\165\163\145\162
\164\162\165\163\164\056\143\157\155\061\035\060\033\006\003\125
\004\003\023\024\125\124\116\055\125\123\105\122\106\151\162\163
\164\055\117\142\152\145\143\164
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\020\104\276\014\213\120\000\044\264\021\323\066\055\340\263
\137\033
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Camerfirma Chambers of Commerce Root"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Camerfirma Chambers of Commerce Root"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\177\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060
\040\006\003\125\004\003\023\031\103\150\141\155\142\145\162\163
\040\157\146\040\103\157\155\155\145\162\143\145\040\122\157\157
\164
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\177\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060
\040\006\003\125\004\003\023\031\103\150\141\155\142\145\162\163
\040\157\146\040\103\157\155\155\145\162\143\145\040\122\157\157
\164
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\275\060\202\003\245\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\177\061\013\060\011\006\003\125\004\006\023\002\105\125\061\047
\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155\145
\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101\070
\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004\013
\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150\141
\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060\040
\006\003\125\004\003\023\031\103\150\141\155\142\145\162\163\040
\157\146\040\103\157\155\155\145\162\143\145\040\122\157\157\164
\060\036\027\015\060\063\060\071\063\060\061\066\061\063\064\063
\132\027\015\063\067\060\071\063\060\061\066\061\063\064\064\132
\060\177\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060
\040\006\003\125\004\003\023\031\103\150\141\155\142\145\162\163
\040\157\146\040\103\157\155\155\145\162\143\145\040\122\157\157
\164\060\202\001\040\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\202\001\015\000\060\202\001\010\002\202\001
\001\000\267\066\125\345\245\135\030\060\340\332\211\124\221\374
\310\307\122\370\057\120\331\357\261\165\163\145\107\175\033\133
\272\165\305\374\241\210\044\372\057\355\312\010\112\071\124\304
\121\172\265\332\140\352\070\074\201\262\313\361\273\331\221\043
\077\110\001\160\165\251\005\052\255\037\161\363\311\124\075\035
\006\152\100\076\263\014\205\356\134\033\171\302\142\304\270\066
\216\065\135\001\014\043\004\107\065\252\233\140\116\240\146\075
\313\046\012\234\100\241\364\135\230\277\161\253\245\000\150\052
\355\203\172\017\242\024\265\324\042\263\200\260\074\014\132\121
\151\055\130\030\217\355\231\236\361\256\342\225\346\366\107\250
\326\014\017\260\130\130\333\303\146\067\236\233\221\124\063\067
\322\224\034\152\110\311\311\362\245\332\245\014\043\367\043\016
\234\062\125\136\161\234\204\005\121\232\055\375\346\116\052\064
\132\336\312\100\067\147\014\124\041\125\167\332\012\014\314\227
\256\200\334\224\066\112\364\076\316\066\023\036\123\344\254\116
\072\005\354\333\256\162\234\070\213\320\071\073\211\012\076\167
\376\165\002\001\003\243\202\001\104\060\202\001\100\060\022\006
\003\125\035\023\001\001\377\004\010\060\006\001\001\377\002\001
\014\060\074\006\003\125\035\037\004\065\060\063\060\061\240\057
\240\055\206\053\150\164\164\160\072\057\057\143\162\154\056\143

\150\141\155\142\145\162\163\151\147\156\056\157\162\147\057\143
\150\141\155\142\145\162\163\162\157\157\164\056\143\162\154\060
\035\006\003\125\035\016\004\026\004\024\343\224\365\261\115\351
\333\241\051\133\127\213\115\166\006\166\341\321\242\212\060\016
\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060\021
\006\011\140\206\110\001\206\370\102\001\001\004\004\003\002\000
\007\060\047\006\003\125\035\021\004\040\060\036\201\034\143\150
\141\155\142\145\162\163\162\157\157\164\100\143\150\141\155\142
\145\162\163\151\147\156\056\157\162\147\060\047\006\003\125\035
\022\004\040\060\036\201\034\143\150\141\155\142\145\162\163\162
\157\157\164\100\143\150\141\155\142\145\162\163\151\147\156\056
\157\162\147\060\130\006\003\125\035\040\004\121\060\117\060\115
\006\013\053\006\001\004\001\201\207\056\012\003\001\060\076\060
\074\006\010\053\006\001\005\005\007\002\001\026\060\150\164\164
\160\072\057\057\143\160\163\056\143\150\141\155\142\145\162\163
\151\147\156\056\157\162\147\057\143\160\163\057\143\150\141\155
\142\145\162\163\162\157\157\164\056\150\164\155\154\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001
\000\014\101\227\302\032\206\300\042\174\237\373\220\363\032\321
\003\261\357\023\371\041\137\004\234\332\311\245\215\047\154\226
\207\221\276\101\220\001\162\223\347\036\175\137\366\211\306\135
\247\100\011\075\254\111\105\105\334\056\215\060\150\262\011\272
\373\303\057\314\272\013\337\077\167\173\106\175\072\022\044\216
\226\217\074\005\012\157\322\224\050\035\155\014\300\056\210\042
\325\330\317\035\023\307\360\110\327\327\005\247\317\307\107\236
\073\074\064\310\200\117\324\024\273\374\015\120\367\372\263\354
\102\137\251\335\155\310\364\165\317\173\301\162\046\261\001\034
\134\054\375\172\116\264\001\305\005\127\271\347\074\252\005\331
\210\351\007\106\101\316\357\101\201\256\130\337\203\242\256\312
\327\167\037\347\000\074\235\157\216\344\062\011\035\115\170\064
\170\064\074\224\233\046\355\117\161\306\031\172\275\040\042\110
\132\376\113\175\003\267\347\130\276\306\062\116\164\036\150\335
\250\150\133\263\076\356\142\175\331\200\350\012\165\172\267\356
\264\145\232\041\220\340\252\320\230\274\070\265\163\074\213\370
\334
END

#

Trust for Certificate "Camerfirma Chambers of Commerce Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Camerfirma Chambers of Commerce Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\156\072\125\244\031\014\031\134\223\204\074\300\333\162\056\061
\060\141\360\261
END

```

CKA_CERT_MD5_HASH MULTILINE_OCTAL
\260\001\356\024\331\257\051\030\224\166\216\361\151\063\052\204
END
CKA_ISSUER MULTILINE_OCTAL
\060\177\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\042\060
\040\006\003\125\004\003\023\031\103\150\141\155\142\145\162\163
\040\157\146\040\103\157\155\155\145\162\143\145\040\122\157\157
\164
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Camerfirma Global Chambersign Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Camerfirma Global Chambersign Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\175\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\040\060
\036\006\003\125\004\003\023\027\107\154\157\142\141\154\040\103
\150\141\155\142\145\162\163\151\147\156\040\122\157\157\164
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\175\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101

```


\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\040\060
\036\006\003\125\004\003\023\027\107\154\157\142\141\154\040\103
\150\141\155\142\145\162\163\151\147\156\040\122\157\157\164

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\305\060\202\003\255\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\175\061\013\060\011\006\003\125\004\006\023\002\105\125\061\047
\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155\145
\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101\070
\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004\013
\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150\141
\155\142\145\162\163\151\147\156\056\157\162\147\061\040\060\036
\006\003\125\004\003\023\027\107\154\157\142\141\154\040\103\150
\141\155\142\145\162\163\151\147\156\040\122\157\157\164\060\036
\027\015\060\063\060\071\063\060\061\066\061\064\061\070\132\027
\015\063\067\060\071\063\060\061\066\061\064\061\070\132\060\175
\061\013\060\011\006\003\125\004\006\023\002\105\125\061\047\060
\045\006\003\125\004\012\023\036\101\103\040\103\141\155\145\162
\146\151\162\155\141\040\123\101\040\103\111\106\040\101\070\062
\067\064\063\062\070\067\061\043\060\041\006\003\125\004\013\023
\032\150\164\164\160\072\057\057\167\167\167\056\143\150\141\155
\142\145\162\163\151\147\156\056\157\162\147\061\040\060\036\006
\003\125\004\003\023\027\107\154\157\142\141\154\040\103\150\141
\155\142\145\162\163\151\147\156\040\122\157\157\164\060\202\001
\040\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\202\001\015\000\060\202\001\010\002\202\001\001\000\242\160
\242\320\237\102\256\133\027\307\330\175\317\024\203\374\117\311
\241\267\023\257\212\327\236\076\004\012\222\213\140\126\372\264
\062\057\210\115\241\140\010\364\267\011\116\240\111\057\111\326
\323\337\235\227\132\237\224\004\160\354\077\131\331\267\314\146
\213\230\122\050\011\002\337\305\057\204\215\172\227\167\277\354
\100\235\045\162\253\265\077\062\230\373\267\267\374\162\204\345
\065\207\371\125\372\243\037\016\157\056\050\335\151\240\331\102
\020\306\370\265\104\302\320\103\177\333\274\344\242\074\152\125
\170\012\167\251\330\352\031\062\267\057\376\134\077\033\356\261
\230\354\312\255\172\151\105\343\226\017\125\366\346\355\165\352
\145\350\062\126\223\106\211\250\045\212\145\006\356\153\277\171
\007\320\361\267\257\355\054\115\222\273\300\250\137\247\147\175
\004\362\025\010\160\254\222\326\175\004\322\063\373\114\266\013
\013\373\032\311\304\215\003\251\176\134\362\120\253\022\245\241
\317\110\120\245\357\322\310\032\023\372\260\177\261\202\034\167
\152\017\137\334\013\225\217\357\103\176\346\105\011\045\002\001

\003\243\202\001\120\060\202\001\114\060\022\006\003\125\035\023
\001\001\377\004\010\060\006\001\001\377\002\001\014\060\077\006
\003\125\035\037\004\070\060\066\060\064\240\062\240\060\206\056
\150\164\164\160\072\057\057\143\162\154\056\143\150\141\155\142
\145\162\163\151\147\156\056\157\162\147\057\143\150\141\155\142
\145\162\163\151\147\156\162\157\157\164\056\143\162\154\060\035
\006\003\125\035\016\004\026\004\024\103\234\066\237\260\236\060
\115\306\316\137\255\020\253\345\003\245\372\251\024\060\016\006
\003\125\035\017\001\001\377\004\004\003\002\001\006\060\021\006
\011\140\206\110\001\206\370\102\001\001\004\004\003\002\000\007
\060\052\006\003\125\035\021\004\043\060\041\201\037\143\150\141
\155\142\145\162\163\151\147\156\162\157\157\164\100\143\150\141
\155\142\145\162\163\151\147\156\056\157\162\147\060\052\006\003
\125\035\022\004\043\060\041\201\037\143\150\141\155\142\145\162
\163\151\147\156\162\157\157\164\100\143\150\141\155\142\145\162
\163\151\147\156\056\157\162\147\060\133\006\003\125\035\040\004
\124\060\122\060\120\006\013\053\006\001\004\001\201\207\056\012
\001\001\060\101\060\077\006\010\053\006\001\005\005\007\002\001
\026\063\150\164\164\160\072\057\057\143\160\163\056\143\150\141
\155\142\145\162\163\151\147\156\056\157\162\147\057\143\160\163
\057\143\150\141\155\142\145\162\163\151\147\156\162\157\157\164
\056\150\164\155\154\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\003\202\001\001\000\074\073\160\221\371\004\124
\047\221\341\355\355\376\150\177\141\135\345\101\145\117\062\361
\030\005\224\152\034\336\037\160\333\076\173\062\002\064\265\014
\154\241\212\174\245\364\217\377\324\330\255\027\325\055\004\321
\077\130\200\342\201\131\210\276\300\343\106\223\044\376\220\275
\046\242\060\055\350\227\046\127\065\211\164\226\030\366\025\342
\257\044\031\126\002\002\262\272\017\024\352\306\212\146\301\206
\105\125\213\276\222\276\234\244\004\307\111\074\236\350\051\172
\211\327\376\257\377\150\365\245\027\220\275\254\231\314\245\206
\127\011\147\106\333\326\026\302\106\361\344\251\120\365\217\321
\222\025\323\137\076\306\000\111\072\156\130\262\321\321\047\015
\045\310\062\370\040\021\315\175\062\063\110\224\124\114\335\334
\171\304\060\237\353\216\270\125\265\327\210\134\305\152\044\075
\262\323\005\003\121\306\007\357\314\024\162\164\075\156\162\316
\030\050\214\112\240\167\345\011\053\105\104\107\254\267\147\177
\001\212\005\132\223\276\241\301\377\370\347\016\147\244\107\111
\166\135\165\220\032\365\046\217\360

END

#

Trust for Certificate "Camerfirma Global Chambersign Root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN

CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

```

CKA_LABEL UTF8 "Camerfirma Global Chambersign Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\063\233\153\024\120\044\233\125\172\001\207\162\204\331\340\057
\303\322\330\351
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\305\346\173\277\006\320\117\103\355\304\172\145\212\373\153\031
END
CKA_ISSUER MULTILINE_OCTAL
\060\175\061\013\060\011\006\003\125\004\006\023\002\105\125\061
\047\060\045\006\003\125\004\012\023\036\101\103\040\103\141\155
\145\162\146\151\162\155\141\040\123\101\040\103\111\106\040\101
\070\062\067\064\063\062\070\067\061\043\060\041\006\003\125\004
\013\023\032\150\164\164\160\072\057\057\167\167\167\056\143\150
\141\155\142\145\162\163\151\147\156\056\157\162\147\061\040\060
\036\006\003\125\004\003\023\027\107\154\157\142\141\154\040\103
\150\141\155\142\145\162\163\151\147\156\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "NetLock Qualified (Class QA) Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Qualified (Class QA) Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\311\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\102\060\100\006\003\125\004
\003\023\071\116\145\164\114\157\143\153\040\115\151\156\157\163
\151\164\145\164\164\040\113\157\172\152\145\147\171\172\157\151
\040\050\103\154\141\163\163\040\121\101\051\040\124\141\156\165
\163\151\164\166\141\156\171\153\151\141\144\157\061\036\060\034

```

\006\011\052\206\110\206\367\015\001\011\001\026\017\151\156\146
\157\100\156\145\164\154\157\143\153\056\150\165

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\311\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\102\060\100\006\003\125\004
\003\023\071\116\145\164\114\157\143\153\040\115\151\156\157\163
\151\164\145\164\164\040\113\157\172\152\145\147\171\172\157\151
\040\050\103\154\141\163\163\040\121\101\051\040\124\141\156\165
\163\151\164\166\141\156\171\153\151\141\144\157\061\036\060\034
\006\011\052\206\110\206\367\015\001\011\001\026\017\151\156\146
\157\100\156\145\164\154\157\143\153\056\150\165

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\173

END

CKA_VALUE MULTILINE_OCTAL

\060\202\006\321\060\202\005\271\240\003\002\001\002\002\001\173
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\201\311\061\013\060\011\006\003\125\004\006\023\002\110\125\061
\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160\145
\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145\164
\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172\164
\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030\006
\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141\156
\171\153\151\141\144\157\153\061\102\060\100\006\003\125\004\003
\023\071\116\145\164\114\157\143\153\040\115\151\156\157\163\151
\164\145\164\164\040\113\157\172\152\145\147\171\172\157\151\040
\050\103\154\141\163\163\040\121\101\051\040\124\141\156\165\163
\151\164\166\141\156\171\153\151\141\144\157\061\036\060\034\006
\011\052\206\110\206\367\015\001\011\001\026\017\151\156\146\157
\100\156\145\164\154\157\143\153\056\150\165\060\036\027\015\060
\063\060\063\063\060\060\061\064\067\061\061\132\027\015\062\062
\061\062\061\065\060\061\064\067\061\061\132\060\201\311\061\013
\060\011\006\003\125\004\006\023\002\110\125\061\021\060\017\006
\003\125\004\007\023\010\102\165\144\141\160\145\163\164\061\047
\060\045\006\003\125\004\012\023\036\116\145\164\114\157\143\153
\040\110\141\154\157\172\141\164\142\151\172\164\157\156\163\141
\147\151\040\113\146\164\056\061\032\060\030\006\003\125\004\013
\023\021\124\141\156\165\163\151\164\166\141\156\171\153\151\141

\144\157\153\061\102\060\100\006\003\125\004\003\023\071\116\145
\164\114\157\143\153\040\115\151\156\157\163\151\164\145\164\164
\040\113\157\172\152\145\147\171\172\157\151\040\050\103\154\141
\163\163\040\121\101\051\040\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\061\036\060\034\006\011\052\206\110
\206\367\015\001\011\001\026\017\151\156\146\157\100\156\145\164
\154\157\143\153\056\150\165\060\202\001\042\060\015\006\011\052
\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060
\202\001\012\002\202\001\001\000\307\122\045\262\330\075\324\204
\125\011\247\033\275\154\271\024\364\212\002\333\166\374\152\052
\170\253\345\167\360\156\340\214\043\147\333\245\144\231\271\335
\001\076\157\357\055\232\074\042\360\135\311\127\240\125\101\177
\362\103\136\130\202\123\061\145\316\036\362\046\272\000\124\036
\257\260\274\034\344\122\214\240\062\257\267\067\261\123\147\150
\164\147\120\366\055\056\144\336\256\046\171\337\337\231\206\253
\253\177\205\354\240\373\200\314\364\270\014\036\223\105\143\271
\334\270\133\233\355\133\071\324\137\142\260\247\216\174\146\070
\054\252\261\010\143\027\147\175\314\275\263\361\303\077\317\120
\071\355\321\031\203\025\333\207\022\047\226\267\332\352\345\235
\274\272\352\071\117\213\357\164\232\347\305\320\322\352\206\121
\034\344\376\144\010\050\004\171\005\353\312\305\161\016\013\357
\253\352\354\022\021\241\030\005\062\151\321\014\054\032\075\045
\231\077\265\174\312\155\260\256\231\231\372\010\140\347\031\302
\362\275\121\323\314\323\002\254\301\021\014\200\316\253\334\224
\235\153\243\071\123\072\326\205\002\003\000\305\175\243\202\002
\300\060\202\002\274\060\022\006\003\125\035\023\001\001\377\004
\010\060\006\001\001\377\002\001\004\060\016\006\003\125\035\017
\001\001\377\004\004\003\002\001\006\060\202\002\165\006\011\140
\206\110\001\206\370\102\001\015\004\202\002\146\026\202\002\142
\106\111\107\131\105\114\105\115\041\040\105\172\145\156\040\164
\141\156\165\163\151\164\166\141\156\171\040\141\040\116\145\164
\114\157\143\153\040\113\146\164\056\040\115\151\156\157\163\151
\164\145\164\164\040\123\172\157\154\147\141\154\164\141\164\141
\163\151\040\123\172\141\142\141\154\171\172\141\164\141\142\141
\156\040\154\145\151\162\164\040\145\154\152\141\162\141\163\157
\153\040\141\154\141\160\152\141\156\040\153\145\163\172\165\154
\164\056\040\101\040\155\151\156\157\163\151\164\145\164\164\040
\145\154\145\153\164\162\157\156\151\153\165\163\040\141\154\141
\151\162\141\163\040\152\157\147\150\141\164\141\163\040\145\162
\166\145\156\171\145\163\165\154\145\163\145\156\145\153\054\040
\166\141\154\141\155\151\156\164\040\145\154\146\157\147\141\144
\141\163\141\156\141\153\040\146\145\154\164\145\164\145\154\145
\040\141\040\115\151\156\157\163\151\164\145\164\164\040\123\172
\157\154\147\141\154\164\141\164\141\163\151\040\123\172\141\142
\141\154\171\172\141\164\142\141\156\054\040\141\172\040\101\154
\164\141\154\141\156\157\163\040\123\172\145\162\172\157\144\145
\163\151\040\106\145\154\164\145\164\145\154\145\153\142\145\156
\040\145\154\157\151\162\164\040\145\154\154\145\156\157\162\172

\145\163\151\040\145\154\152\141\162\141\163\040\155\145\147\164
\145\164\145\154\145\056\040\101\040\144\157\153\165\155\145\156
\164\165\155\157\153\040\155\145\147\164\141\154\141\154\150\141
\164\157\153\040\141\040\150\164\164\160\163\072\057\057\167\167
\167\056\156\145\164\154\157\143\153\056\150\165\057\144\157\143
\163\057\040\143\151\155\145\156\040\166\141\147\171\040\153\145
\162\150\145\164\157\153\040\141\172\040\151\156\146\157\100\156
\145\164\154\157\143\153\056\156\145\164\040\145\055\155\141\151
\154\040\143\151\155\145\156\056\040\127\101\122\116\111\116\107
\041\040\124\150\145\040\151\163\163\165\141\156\143\145\040\141
\156\144\040\164\150\145\040\165\163\145\040\157\146\040\164\150
\151\163\040\143\145\162\164\151\146\151\143\141\164\145\040\141
\162\145\040\163\165\142\152\145\143\164\040\164\157\040\164\150
\145\040\116\145\164\114\157\143\153\040\121\165\141\154\151\146
\151\145\144\040\103\120\123\040\141\166\141\151\154\141\142\154
\145\040\141\164\040\150\164\164\160\163\072\057\057\167\167\167
\056\156\145\164\154\157\143\153\056\150\165\057\144\157\143\163
\057\040\157\162\040\142\171\040\145\055\155\141\151\154\040\141
\164\040\151\156\146\157\100\156\145\164\154\157\143\153\056\156
\145\164\060\035\006\003\125\035\016\004\026\004\024\011\152\142
\026\222\260\132\273\125\016\313\165\062\072\062\345\262\041\311
\050\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\202\001\001\000\221\152\120\234\333\170\201\233\077\213\102
\343\073\374\246\303\356\103\340\317\363\342\200\065\111\105\166
\002\342\343\057\005\305\361\052\347\300\101\063\306\266\233\320
\063\071\315\300\333\241\255\154\067\002\114\130\101\073\362\227
\222\306\110\250\315\345\212\071\211\141\371\122\227\351\275\366
\371\224\164\350\161\016\274\167\206\303\006\314\132\174\112\176
\064\120\060\056\373\177\062\232\215\075\363\040\133\370\152\312
\206\363\061\114\054\131\200\002\175\376\070\311\060\165\034\267
\125\343\274\237\272\250\155\204\050\005\165\263\213\015\300\221
\124\041\347\246\013\264\231\365\121\101\334\315\243\107\042\331
\307\001\201\304\334\107\117\046\352\037\355\333\315\015\230\364
\243\234\264\163\062\112\226\231\376\274\177\310\045\130\370\130
\363\166\146\211\124\244\246\076\304\120\134\272\211\030\202\165
\110\041\322\117\023\350\140\176\007\166\333\020\265\121\346\252
\271\150\252\315\366\235\220\165\022\352\070\032\312\104\350\267
\231\247\052\150\225\146\225\253\255\357\211\313\140\251\006\022
\306\224\107\351\050

END

#

Trust for Certificate "NetLock Qualified (Class QA) Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Qualified (Class QA) Root"

```

CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\001\150\227\341\240\270\362\303\261\064\146\134\040\247\047\267
\241\130\342\217
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\324\200\145\150\044\371\211\042\050\333\365\244\232\027\217\024
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\311\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\102\060\100\006\003\125\004
\003\023\071\116\145\164\114\157\143\153\040\115\151\156\157\163
\151\164\145\164\164\040\113\157\172\152\145\147\171\172\157\151
\040\050\103\154\141\163\163\040\121\101\051\040\124\141\156\165
\163\151\164\166\141\156\171\153\151\141\144\157\061\036\060\034
\006\011\052\206\110\206\367\015\001\011\001\026\017\151\156\146
\157\100\156\145\164\154\157\143\153\056\150\165
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\173
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE

#
# Certificate "NetLock Notary (Class A) Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Notary (Class A) Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\257\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\020\060\016\006\003\125\004\010\023\007\110\165\156\147\141
\162\171\061\021\060\017\006\003\125\004\007\023\010\102\165\144
\141\160\145\163\164\061\047\060\045\006\003\125\004\012\023\036
\116\145\164\114\157\143\153\040\110\141\154\157\172\141\164\142
\151\172\164\157\156\163\141\147\151\040\113\146\164\056\061\032

```

\060\030\006\003\125\004\013\023\021\124\141\156\165\163\151\164
\166\141\156\171\153\151\141\144\157\153\061\066\060\064\006\003
\125\004\003\023\055\116\145\164\114\157\143\153\040\113\157\172
\152\145\147\171\172\157\151\040\050\103\154\141\163\163\040\101
\051\040\124\141\156\165\163\151\164\166\141\156\171\153\151\141
\144\157

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\257\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\020\060\016\006\003\125\004\010\023\007\110\165\156\147\141
\162\171\061\021\060\017\006\003\125\004\007\023\010\102\165\144
\141\160\145\163\164\061\047\060\045\006\003\125\004\012\023\036
\116\145\164\114\157\143\153\040\110\141\154\157\172\141\164\142
\151\172\164\157\156\163\141\147\151\040\113\146\164\056\061\032
\060\030\006\003\125\004\013\023\021\124\141\156\165\163\151\164
\166\141\156\171\153\151\141\144\157\153\061\066\060\064\006\003
\125\004\003\023\055\116\145\164\114\157\143\153\040\113\157\172
\152\145\147\171\172\157\151\040\050\103\154\141\163\163\040\101
\051\040\124\141\156\165\163\151\164\166\141\156\171\153\151\141
\144\157

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\002\001\003

END

CKA_VALUE MULTILINE_OCTAL

\060\202\006\175\060\202\005\145\240\003\002\001\002\002\002\001
\003\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000
\060\201\257\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\020\060\016\006\003\125\004\010\023\007\110\165\156\147\141
\162\171\061\021\060\017\006\003\125\004\007\023\010\102\165\144
\141\160\145\163\164\061\047\060\045\006\003\125\004\012\023\036
\116\145\164\114\157\143\153\040\110\141\154\157\172\141\164\142
\151\172\164\157\156\163\141\147\151\040\113\146\164\056\061\032
\060\030\006\003\125\004\013\023\021\124\141\156\165\163\151\164
\166\141\156\171\153\151\141\144\157\153\061\066\060\064\006\003
\125\004\003\023\055\116\145\164\114\157\143\153\040\113\157\172
\152\145\147\171\172\157\151\040\050\103\154\141\163\163\040\101
\051\040\124\141\156\165\163\151\164\166\141\156\171\153\151\141
\144\157\060\036\027\015\071\071\060\062\062\064\062\063\061\064
\064\067\132\027\015\061\071\060\062\061\071\062\063\061\064\064
\067\132\060\201\257\061\013\060\011\006\003\125\004\006\023\002
\110\125\061\020\060\016\006\003\125\004\010\023\007\110\165\156
\147\141\162\171\061\021\060\017\006\003\125\004\007\023\010\102
\165\144\141\160\145\163\164\061\047\060\045\006\003\125\004\012
\023\036\116\145\164\114\157\143\153\040\110\141\154\157\172\141
\164\142\151\172\164\157\156\163\141\147\151\040\113\146\164\056

\061\032\060\030\006\003\125\004\013\023\021\124\141\156\165\163
\151\164\166\141\156\171\153\151\141\144\157\153\061\066\060\064
\006\003\125\004\003\023\055\116\145\164\114\157\143\153\040\113
\157\172\152\145\147\171\172\157\151\040\050\103\154\141\163\163
\040\101\051\040\124\141\156\165\163\151\164\166\141\156\171\153
\151\141\144\157\060\202\001\042\060\015\006\011\052\206\110\206
\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012
\002\202\001\001\000\274\164\214\017\273\114\364\067\036\251\005
\202\330\346\341\154\160\352\170\265\156\321\070\104\015\250\203
\316\135\322\326\325\201\305\324\113\347\133\224\160\046\333\073
\235\152\114\142\367\161\363\144\326\141\073\075\353\163\243\067
\331\317\352\214\222\073\315\367\007\334\146\164\227\364\105\042
\335\364\134\340\277\155\363\276\145\063\344\025\072\277\333\230
\220\125\070\304\355\246\125\143\013\260\170\004\364\343\156\301
\077\216\374\121\170\037\222\236\203\302\376\331\260\251\311\274
\132\000\377\251\250\230\164\373\366\054\076\025\071\015\266\004
\125\250\016\230\040\102\263\261\045\255\176\232\157\135\123\261
\253\014\374\353\340\363\172\263\250\263\377\106\366\143\242\330
\072\230\173\266\254\205\377\260\045\117\164\143\347\023\007\245
\012\217\005\367\300\144\157\176\247\047\200\226\336\324\056\206
\140\307\153\053\136\163\173\027\347\221\077\144\014\330\113\042
\064\053\233\062\362\110\037\237\241\012\204\172\342\302\255\227
\075\216\325\301\371\126\243\120\351\306\264\372\230\242\356\225
\346\052\003\214\337\002\003\001\000\001\243\202\002\237\060\202
\002\233\060\016\006\003\125\035\017\001\001\377\004\004\003\002
\000\006\060\022\006\003\125\035\023\001\001\377\004\010\060\006
\001\001\377\002\001\004\060\021\006\011\140\206\110\001\206\370
\102\001\001\004\004\003\002\000\007\060\202\002\140\006\011\140
\206\110\001\206\370\102\001\015\004\202\002\121\026\202\002\115
\106\111\107\131\105\114\105\115\041\040\105\172\145\156\040\164
\141\156\165\163\151\164\166\141\156\171\040\141\040\116\145\164
\114\157\143\153\040\113\146\164\056\040\101\154\164\141\154\141
\156\157\163\040\123\172\157\154\147\141\154\164\141\164\141\163
\151\040\106\145\154\164\145\164\145\154\145\151\142\145\156\040
\154\145\151\162\164\040\145\154\152\141\162\141\163\157\153\040
\141\154\141\160\152\141\156\040\153\145\163\172\165\154\164\056
\040\101\040\150\151\164\145\154\145\163\151\164\145\163\040\146
\157\154\171\141\155\141\164\141\164\040\141\040\116\145\164\114
\157\143\153\040\113\146\164\056\040\164\145\162\155\145\153\146
\145\154\145\154\157\163\163\145\147\055\142\151\172\164\157\163
\151\164\141\163\141\040\166\145\144\151\056\040\101\040\144\151
\147\151\164\141\154\151\163\040\141\154\141\151\162\141\163\040
\145\154\146\157\147\141\144\141\163\141\156\141\153\040\146\145
\154\164\145\164\145\154\145\040\141\172\040\145\154\157\151\162
\164\040\145\154\154\145\156\157\162\172\145\163\151\040\145\154
\152\141\162\141\163\040\155\145\147\164\145\164\145\154\145\056
\040\101\172\040\145\154\152\141\162\141\163\040\154\145\151\162
\141\163\141\040\155\145\147\164\141\154\141\154\150\141\164\157

\040\141\040\116\145\164\114\157\143\153\040\113\146\164\056\040
\111\156\164\145\162\156\145\164\040\150\157\156\154\141\160\152
\141\156\040\141\040\150\164\164\160\163\072\057\057\167\167\167
\056\156\145\164\154\157\143\153\056\156\145\164\057\144\157\143
\163\040\143\151\155\145\156\040\166\141\147\171\040\153\145\162
\150\145\164\157\040\141\172\040\145\154\154\145\156\157\162\172
\145\163\100\156\145\164\154\157\143\153\056\156\145\164\040\145
\055\155\141\151\154\040\143\151\155\145\156\056\040\111\115\120
\117\122\124\101\116\124\041\040\124\150\145\040\151\163\163\165
\141\156\143\145\040\141\156\144\040\164\150\145\040\165\163\145
\040\157\146\040\164\150\151\163\040\143\145\162\164\151\146\151
\143\141\164\145\040\151\163\040\163\165\142\152\145\143\164\040
\164\157\040\164\150\145\040\116\145\164\114\157\143\153\040\103
\120\123\040\141\166\141\151\154\141\142\154\145\040\141\164\040
\150\164\164\160\163\072\057\057\167\167\167\056\156\145\164\154
\157\143\153\056\156\145\164\057\144\157\143\163\040\157\162\040
\142\171\040\145\055\155\141\151\154\040\141\164\040\143\160\163
\100\156\145\164\154\157\143\153\056\156\145\164\056\060\015\006
\011\052\206\110\206\367\015\001\001\004\005\000\003\202\001\001
\000\110\044\106\367\272\126\157\372\310\050\003\100\116\345\061
\071\153\046\153\123\177\333\337\337\363\161\075\046\300\024\016
\306\147\173\043\250\014\163\335\001\273\306\312\156\067\071\125
\325\307\214\126\040\016\050\012\016\322\052\244\260\111\122\306
\070\007\376\276\012\011\214\321\230\317\312\332\024\061\241\117
\322\071\374\017\021\054\103\303\335\253\223\307\125\076\107\174
\030\032\000\334\363\173\330\362\177\122\154\040\364\013\137\151
\122\364\356\370\262\051\140\353\343\111\061\041\015\326\265\020
\101\342\101\011\154\342\032\232\126\113\167\002\366\240\233\232
\047\207\350\125\051\161\302\220\237\105\170\032\341\025\144\075
\320\016\330\240\166\237\256\305\320\056\352\326\017\126\354\144
\177\132\233\024\130\001\047\176\023\120\307\153\052\346\150\074
\277\134\240\012\033\341\016\172\351\342\200\303\351\351\366\375
\154\021\236\320\345\050\047\053\124\062\102\024\202\165\346\112
\360\053\146\165\143\214\242\373\004\076\203\016\233\066\360\030
\344\046\040\303\214\360\050\007\255\074\027\146\210\265\375\266
\210
END

#

Trust for Certificate "NetLock Notary (Class A) Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Notary (Class A) Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\254\355\137\145\123\375\045\316\001\137\037\172\110\073\152\164
\237\141\170\306

```
END
CKA_CERT_MD5_HASH
MULTILINE_OCTAL
\206\070\155\136\111\143\154\205\134\333\155\334\224\267\320\367
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\257\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\020\060\016\006\003\125\004\010\023\007\110\165\156\147\141
\162\171\061\021\060\017\006\003\125\004\007\023\010\102\165\144
\141\160\145\163\164\061\047\060\045\006\003\125\004\012\023\036
\116\145\164\114\157\143\153\040\110\141\154\157\172\141\164\142
\151\172\164\157\156\163\141\147\151\040\113\146\164\056\061\032
\060\030\006\003\125\004\013\023\021\124\141\156\165\163\151\164
\166\141\156\171\153\151\141\144\157\153\061\066\060\064\006\003
\125\004\003\023\055\116\145\164\114\157\143\153\040\113\157\172
\152\145\147\171\172\157\151\040\050\103\154\141\163\163\040\101
\051\040\124\141\156\165\163\151\164\166\141\156\171\153\151\141
\144\157
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\002\001\003
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "NetLock Business (Class B) Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Business (Class B) Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\231\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\062\060\060\006\003\125\004
\003\023\051\116\145\164\114\157\143\153\040\125\172\154\145\164
\151\040\050\103\154\141\163\163\040\102\051\040\124\141\156\165
\163\151\164\166\141\156\171\153\151\141\144\157
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\231\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\062\060\060\006\003\125\004
\003\023\051\116\145\164\114\157\143\153\040\125\172\154\145\164
\151\040\050\103\154\141\163\163\040\102\051\040\124\141\156\165
\163\151\164\166\141\156\171\153\151\141\144\157

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\151

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\113\060\202\004\264\240\003\002\001\002\002\001\151
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\201\231\061\013\060\011\006\003\125\004\006\023\002\110\125\061
\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160\145
\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145\164
\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172\164
\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030\006
\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141\156
\171\153\151\141\144\157\153\061\062\060\060\006\003\125\004\003
\023\051\116\145\164\114\157\143\153\040\125\172\154\145\164\151
\040\050\103\154\141\163\163\040\102\051\040\124\141\156\165\163
\151\164\166\141\156\171\153\151\141\144\157\060\036\027\015\071
\071\060\062\062\065\061\064\061\060\062\062\132\027\015\061\071
\060\062\062\060\061\064\061\060\062\062\132\060\201\231\061\013
\060\011\006\003\125\004\006\023\002\110\125\061\021\060\017\006
\003\125\004\007\023\010\102\165\144\141\160\145\163\164\061\047
\060\045\006\003\125\004\012\023\036\116\145\164\114\157\143\153
\040\110\141\154\157\172\141\164\142\151\172\164\157\156\163\141
\147\151\040\113\146\164\056\061\032\060\030\006\003\125\004\013
\023\021\124\141\156\165\163\151\164\166\141\156\171\153\151\141
\144\157\153\061\062\060\060\006\003\125\004\003\023\051\116\145
\164\114\157\143\153\040\125\172\154\145\164\151\040\050\103\154
\141\163\163\040\102\051\040\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\060\201\237\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\201\215\000\060\201\211
\002\201\201\000\261\352\004\354\040\240\043\302\217\070\140\317
\307\106\263\325\033\376\373\271\231\236\004\334\034\177\214\112
\201\230\356\244\324\312\212\027\271\042\177\203\012\165\114\233
\300\151\330\144\071\243\355\222\243\375\133\134\164\032\300\107

\312\072\151\166\232\272\342\104\027\374\114\243\325\376\270\227
\210\257\210\003\211\037\244\362\004\076\310\007\013\346\371\263
\057\172\142\024\011\106\024\312\144\365\213\200\265\142\250\330
\153\326\161\223\055\263\277\011\124\130\355\006\353\250\173\334
\103\261\241\151\002\003\001\000\001\243\202\002\237\060\202\002
\233\060\022\006\003\125\035\023\001\001\377\004\010\060\006\001
\001\377\002\001\004\060\016\006\003\125\035\017\001\001\377\004
\004\003\002\000\006\060\021\006\011\140\206\110\001\206\370\102
\001\001\004\004\003\002\000\007\060\202\002\140\006\011\140\206
\110\001\206\370\102\001\015\004\202\002\121\026\202\002\115\106
\111\107\131\105\114\105\115\041\040\105\172\145\156\040\164\141
\156\165\163\151\164\166\141\156\171\040\141\040\116\145\164\114
\157\143\153\040\113\146\164\056\040\101\154\164\141\154\141\156
\157\163\040\123\172\157\154\147\141\154\164\141\164\141\163\151
\040\106\145\154\164\145\164\145\154\145\151\142\145\156\040\154
\145\151\162\164\040\145\154\152\141\162\141\163\157\153\040\141
\154\141\160\152\141\156\040\153\145\163\172\165\154\164\056\040
\101\040\150\151\164\145\154\145\163\151\164\145\163\040\146\157
\154\171\141\155\141\164\141\164\040\141\040\116\145\164\114\157
\143\153\040\113\146\164\056\040\164\145\162\155\145\153\146\145
\154\145\154\157\163\163\145\147\055\142\151\172\164\157\163\151
\164\141\163\141\040\166\145\144\151\056\040\101\040\144\151\147
\151\164\141\154\151\163\040\141\154\141\151\162\141\163\040\145
\154\146\157\147\141\144\141\163\141\156\141\153\040\146\145\154
\164\145\164\145\154\145\040\141\172\040\145\154\157\151\162\164
\040\145\154\154\145\156\157\162\172\145\163\151\040\145\154\152
\141\162\141\163\040\155\145\147\164\145\164\145\154\145\056\040
\101\172\040\145\154\152\141\162\141\163\040\154\145\151\162\141
\163\141\040\155\145\147\164\141\154\141\154\150\141\164\157\040
\141\040\116\145\164\114\157\143\153\040\113\146\164\056\040\111
\156\164\145\162\156\145\164\040\150\157\156\154\141\160\152\141
\156\040\141\040\150\164\164\160\163\072\057\057\167\167\167\056
\156\145\164\154\157\143\153\056\156\145\164\057\144\157\143\163
\040\143\151\155\145\156\040\166\141\147\171\040\153\145\162\150
\145\164\157\040\141\172\040\145\154\154\145\156\157\162\172\145
\163\100\156\145\164\154\157\143\153\056\156\145\164\040\145\055
\155\141\151\154\040\143\151\155\145\156\056\040\111\115\120\117
\122\124\101\116\124\041\040\124\150\145\040\151\163\163\165\141
\156\143\145\040\141\156\144\040\164\150\145\040\165\163\145\040
\157\146\040\164\150\151\163\040\143\145\162\164\151\146\151\143
\141\164\145\040\151\163\040\163\165\142\152\145\143\164\040\164
\157\040\164\150\145\040\116\145\164\114\157\143\153\040\103\120
\123\040\141\166\141\151\154\141\142\154\145\040\141\164\040\150
\164\164\160\163\072\057\057\167\167\167\056\156\145\164\154\157
\143\153\056\156\145\164\057\144\157\143\163\040\157\162\040\142
\171\040\145\055\155\141\151\154\040\141\164\040\143\160\163\100
\156\145\164\154\157\143\153\056\156\145\164\056\060\015\006\011
\052\206\110\206\367\015\001\001\004\005\000\003\201\201\000\004

```
\333\256\214\027\257\370\016\220\061\116\315\076\011\300\155\072
\260\370\063\114\107\114\343\165\210\020\227\254\260\070\025\221
\306\051\226\314\041\300\155\074\245\164\317\330\202\245\071\303
\145\343\102\160\273\042\220\343\175\333\065\166\341\240\265\332
\237\160\156\223\032\060\071\035\060\333\056\343\174\262\221\262
\321\067\051\372\271\326\027\134\107\117\343\035\070\353\237\325
\173\225\250\050\236\025\112\321\321\320\053\000\227\240\342\222
\066\053\143\254\130\001\153\063\051\120\206\203\361\001\110
END
```

```
#
```

```
Trust for Certificate "NetLock Business (Class B) Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Business (Class B) Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\207\237\113\356\005\337\230\130\073\343\140\326\063\347\015\077
\376\230\161\257
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\071\026\252\271\152\101\341\024\151\337\236\154\073\162\334\266
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\231\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\062\060\060\006\003\125\004
\003\023\051\116\145\164\114\157\143\153\040\125\172\154\145\164
\151\040\050\103\154\141\163\163\040\102\051\040\124\141\156\165
\163\151\164\166\141\156\171\153\151\141\144\157
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\151
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "NetLock Express (Class C) Root"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE
CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Express (Class C) Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\233\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\064\060\062\006\003\125\004
\003\023\053\116\145\164\114\157\143\153\040\105\170\160\162\145
\163\163\172\040\050\103\154\141\163\163\040\103\051\040\124\141
\156\165\163\151\164\166\141\156\171\153\151\141\144\157
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\233\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\064\060\062\006\003\125\004
\003\023\053\116\145\164\114\157\143\153\040\105\170\160\162\145
\163\163\172\040\050\103\154\141\163\163\040\103\051\040\124\141
\156\165\163\151\164\166\141\156\171\153\151\141\144\157
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\150
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\117\060\202\004\270\240\003\002\001\002\002\001\150
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\201\233\061\013\060\011\006\003\125\004\006\023\002\110\125\061
\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160\145
\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145\164
\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172\164
\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030\006
\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141\156
\171\153\151\141\144\157\153\061\064\060\062\006\003\125\004\003
\023\053\116\145\164\114\157\143\153\040\105\170\160\162\145\163
\163\172\040\050\103\154\141\163\163\040\103\051\040\124\141\156
```

\165\163\151\164\166\141\156\171\153\151\141\144\157\060\036\027
\015\071\071\060\062\062\065\061\064\060\070\061\061\132\027\015
\061\071\060\062\062\060\061\064\060\070\061\061\132\060\201\233
\061\013\060\011\006\003\125\004\006\023\002\110\125\061\021\060
\017\006\003\125\004\007\023\010\102\165\144\141\160\145\163\164
\061\047\060\045\006\003\125\004\012\023\036\116\145\164\114\157
\143\153\040\110\141\154\157\172\141\164\142\151\172\164\157\156
\163\141\147\151\040\113\146\164\056\061\032\060\030\006\003\125
\004\013\023\021\124\141\156\165\163\151\164\166\141\156\171\153
\151\141\144\157\153\061\064\060\062\006\003\125\004\003\023\053
\116\145\164\114\157\143\153\040\105\170\160\162\145\163\163\172
\040\050\103\154\141\163\163\040\103\051\040\124\141\156\165\163
\151\164\166\141\156\171\153\151\141\144\157\060\201\237\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\201\215
\000\060\201\211\002\201\201\000\353\354\260\154\141\212\043\045
\257\140\040\343\331\237\374\223\013\333\135\215\260\241\263\100
\072\202\316\375\165\340\170\062\003\206\132\206\225\221\355\123
\372\235\100\374\346\350\335\331\133\172\003\275\135\363\073\014
\303\121\171\233\255\125\240\351\320\003\020\257\012\272\024\102
\331\122\046\021\042\307\322\040\314\202\244\232\251\376\270\201
\166\235\152\267\322\066\165\076\261\206\011\366\156\155\176\116
\267\172\354\256\161\204\366\004\063\010\045\062\353\164\254\026
\104\306\344\100\223\035\177\255\002\003\001\000\001\243\202\002
\237\060\202\002\233\060\022\006\003\125\035\023\001\001\377\004
\010\060\006\001\001\377\002\001\004\060\016\006\003\125\035\017
\001\001\377\004\004\003\002\000\006\060\021\006\011\140\206\110
\001\206\370\102\001\001\004\004\003\002\000\007\060\202\002\140
\006\011\140\206\110\001\206\370\102\001\015\004\202\002\121\026
\202\002\115\106\111\107\131\105\114\105\115\041\040\105\172\145
\156\040\164\141\156\165\163\151\164\166\141\156\171\040\141\040
\116\145\164\114\157\143\153\040\113\146\164\056\040\101\154\164
\141\154\141\156\157\163\040\123\172\157\154\147\141\154\164\141
\164\141\163\151\040\106\145\154\164\145\164\145\154\145\151\142
\145\156\040\154\145\151\162\164\040\145\154\152\141\162\141\163
\157\153\040\141\154\141\160\152\141\156\040\153\145\163\172\165
\154\164\056\040\101\040\150\151\164\145\154\145\163\151\164\145
\163\040\146\157\154\171\141\155\141\164\141\164\040\141\040\116
\145\164\114\157\143\153\040\113\146\164\056\040\164\145\162\155
\145\153\146\145\154\145\154\157\163\163\145\147\055\142\151\172
\164\157\163\151\164\141\163\141\040\166\145\144\151\056\040\101
\040\144\151\147\151\164\141\154\151\163\040\141\154\141\151\162
\141\163\040\145\154\146\157\147\141\144\141\163\141\156\141\153
\040\146\145\154\164\145\164\145\154\145\040\141\172\040\145\154
\157\151\162\164\040\145\154\154\145\156\157\162\172\145\163\151
\040\145\154\152\141\162\141\163\040\155\145\147\164\145\164\145
\154\145\056\040\101\172\040\145\154\152\141\162\141\163\040\154
\145\151\162\141\163\141\040\155\145\147\164\141\154\141\154\150
\141\164\157\040\141\040\116\145\164\114\157\143\153\040\113\146


```
\164\056\040\111\156\164\145\162\156\145\164\040\150\157\156\154
\141\160\152\141\156\040\141\040\150\164\164\160\163\072\057\057
\167\167\167\056\156\145\164\154\157\143\153\056\156\145\164\057
\144\157\143\163\040\143\151\155\145\156\040\166\141\147\171\040
\153\145\162\150\145\164\157\040\141\172\040\145\154\154\145\156
\157\162\172\145\163\100\156\145\164\154\157\143\153\056\156\145
\164\040\145\055\155\141\151\154\040\143\151\155\145\156\056\040
\111\115\120\117\122\124\101\116\124\041\040\124\150\145\040\151
\163\163\165\141\156\143\145\040\141\156\144\040\164\150\145\040
\165\163\145\040\157\146\040\164\150\151\163\040\143\145\162\164
\151\146\151\143\141\164\145\040\151\163\040\163\165\142\152\145
\143\164\040\164\157\040\164\150\145\040\116\145\164\114\157\143
\153\040\103\120\123\040\141\166\141\151\154\141\142\154\145\040
\141\164\040\150\164\164\160\163\072\057\057\167\167\167\056\156
\145\164\154\157\143\153\056\156\145\164\057\144\157\143\163\040
\157\162\040\142\171\040\145\055\155\141\151\154\040\141\164\040
\143\160\163\100\156\145\164\154\157\143\153\056\156\145\164\056
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\003
\201\201\000\020\255\177\327\014\062\200\012\330\206\361\171\230
\265\255\324\315\263\066\304\226\110\301\134\315\232\331\005\056
\237\276\120\353\364\046\024\020\055\324\146\027\370\236\301\047
\375\361\355\344\173\113\240\154\265\253\232\127\160\246\355\240
\244\355\056\365\375\374\275\376\115\067\010\014\274\343\226\203
\042\365\111\033\177\113\053\264\124\301\200\174\231\116\035\320
\214\356\320\254\345\222\372\165\126\376\144\240\023\217\270\270
\026\235\141\005\147\200\310\320\330\245\007\002\064\230\004\215
\063\004\324
```

END

#

Trust for Certificate "NetLock Express (Class C) Root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "NetLock Express (Class C) Root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\343\222\121\057\012\317\365\005\337\366\336\006\177\165\067\341
```

```
\145\352\127\113
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\117\353\361\360\160\302\200\143\135\130\237\332\022\074\251\304
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\233\061\013\060\011\006\003\125\004\006\023\002\110\125
```

```
\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160
```

```
\145\163\164\061\047\060\045\006\003\125\004\012\023\036\116\145
```

```
\164\114\157\143\153\040\110\141\154\157\172\141\164\142\151\172
```

```
\164\157\156\163\141\147\151\040\113\146\164\056\061\032\060\030
\006\003\125\004\013\023\021\124\141\156\165\163\151\164\166\141
\156\171\153\151\141\144\157\153\061\064\060\062\006\003\125\004
\003\023\053\116\145\164\114\157\143\153\040\105\170\160\162\145
\163\163\172\040\050\103\154\141\163\163\040\103\051\040\124\141
\156\165\163\151\164\166\141\156\171\153\151\141\144\157
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\150
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "XRamp Global CA Root"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "XRamp Global CA Root"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\036\060\034\006\003\125\004\013\023\025\167\167\167\056\170
\162\141\155\160\163\145\143\165\162\151\164\171\056\143\157\155
\061\044\060\042\006\003\125\004\012\023\033\130\122\141\155\160
\040\123\145\143\165\162\151\164\171\040\123\145\162\166\151\143
\145\163\040\111\156\143\061\055\060\053\006\003\125\004\003\023
\044\130\122\141\155\160\040\107\154\157\142\141\154\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\036\060\034\006\003\125\004\013\023\025\167\167\167\056\170
\162\141\155\160\163\145\143\165\162\151\164\171\056\143\157\155
\061\044\060\042\006\003\125\004\012\023\033\130\122\141\155\160
\040\123\145\143\165\162\151\164\171\040\123\145\162\166\151\143
\145\163\040\111\156\143\061\055\060\053\006\003\125\004\003\023
\044\130\122\141\155\160\040\107\154\157\142\141\154\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\120\224\154\354\030\352\325\234\115\325\227\357\165\217
\240\255

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\060\060\202\003\030\240\003\002\001\002\002\020\120
\224\154\354\030\352\325\234\115\325\227\357\165\217\240\255\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\202\061\013\060\011\006\003\125\004\006\023\002\125\123\061\036
\060\034\006\003\125\004\013\023\025\167\167\167\056\170\162\141
\155\160\163\145\143\165\162\151\164\171\056\143\157\155\061\044
\060\042\006\003\125\004\012\023\033\130\122\141\155\160\040\123
\145\143\165\162\151\164\171\040\123\145\162\166\151\143\145\163
\040\111\156\143\061\055\060\053\006\003\125\004\003\023\044\130
\122\141\155\160\040\107\154\157\142\141\154\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\060\036\027\015\060\064\061\061\060\061\061\067\061
\064\060\064\132\027\015\063\065\060\061\060\061\060\065\063\067
\061\071\132\060\201\202\061\013\060\011\006\003\125\004\006\023
\002\125\123\061\036\060\034\006\003\125\004\013\023\025\167\167
\167\056\170\162\141\155\160\163\145\143\165\162\151\164\171\056
\143\157\155\061\044\060\042\006\003\125\004\012\023\033\130\122
\141\155\160\040\123\145\143\165\162\151\164\171\040\123\145\162
\166\151\143\145\163\040\111\156\143\061\055\060\053\006\003\125
\004\003\023\044\130\122\141\155\160\040\107\154\157\142\141\154
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\230\044\036\275\025\264\272
\337\307\214\245\047\266\070\013\151\363\266\116\250\054\056\041
\035\134\104\337\041\135\176\043\164\376\136\176\264\112\267\246
\255\037\256\340\006\026\342\233\133\331\147\164\153\135\200\217
\051\235\206\033\331\234\015\230\155\166\020\050\130\344\145\260
\177\112\230\171\237\340\303\061\176\200\053\265\214\300\100\073
\021\206\320\313\242\206\066\140\244\325\060\202\155\331\156\320
\017\022\004\063\227\137\117\141\132\360\344\371\221\253\347\035
\073\274\350\317\364\153\055\064\174\342\110\141\034\216\363\141
\104\314\157\240\112\251\224\260\115\332\347\251\064\172\162\070
\250\101\314\074\224\021\175\353\310\246\214\267\206\313\312\063
\073\331\075\067\213\373\172\076\206\054\347\163\327\012\127\254
\144\233\031\353\364\017\004\010\212\254\003\027\031\144\364\132
\045\042\215\064\054\262\366\150\035\022\155\323\212\036\024\332
\304\217\246\342\043\205\325\172\015\275\152\340\351\354\354\027
\273\102\033\147\252\045\355\105\203\041\374\301\311\174\325\142
\076\372\362\305\055\323\375\324\145\002\003\001\000\001\243\201
\237\060\201\234\060\023\006\011\053\006\001\004\001\202\067\024

```
\002\004\006\036\004\000\103\000\101\060\013\006\003\125\035\017
\004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026
\004\024\306\117\242\075\006\143\204\011\234\316\142\344\004\254
\215\134\265\351\266\033\060\066\006\003\125\035\037\004\057\060
\055\060\053\240\051\240\047\206\045\150\164\164\160\072\057\057
\143\162\154\056\170\162\141\155\160\163\145\143\165\162\151\164
\171\056\143\157\155\057\130\107\103\101\056\143\162\154\060\020
\006\011\053\006\001\004\001\202\067\025\001\004\003\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\221\025\071\003\001\033\147\373\112\034\371\012
\140\133\241\332\115\227\142\371\044\123\047\327\202\144\116\220
\056\303\111\033\053\232\334\374\250\170\147\065\361\035\360\021
\275\267\110\343\020\366\015\337\077\322\311\266\252\125\244\110
\272\002\333\336\131\056\025\133\073\235\026\175\107\327\067\352
\137\115\166\022\066\273\037\327\241\201\004\106\040\243\054\155
\251\236\001\176\077\051\316\000\223\337\375\311\222\163\211\211
\144\236\347\053\344\034\221\054\322\271\316\175\316\157\061\231
\323\346\276\322\036\220\360\011\024\171\134\043\253\115\322\332
\041\037\115\231\171\235\341\317\047\237\020\233\034\210\015\260
\212\144\101\061\270\016\154\220\044\244\233\134\161\217\272\273
\176\034\033\333\152\200\017\041\274\351\333\246\267\100\364\262
\213\251\261\344\357\232\032\320\075\151\231\356\250\050\243\341
\074\263\360\262\021\234\317\174\100\346\335\347\103\175\242\330
\072\265\251\215\362\064\231\304\324\020\341\006\375\011\204\020
\073\356\304\114\364\354\047\174\102\302\164\174\202\212\011\311
\264\003\045\274
```

END

#

Trust for Certificate "XRamp Global CA Root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "XRamp Global CA Root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\270\001\206\321\353\234\206\245\101\004\317\060\124\363\114\122
\267\345\130\306
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\241\013\104\263\312\020\330\000\156\235\017\330\017\222\012\321
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\036\060\034\006\003\125\004\013\023\025\167\167\167\056\170
\162\141\155\160\163\145\143\165\162\151\164\171\056\143\157\155
\061\044\060\042\006\003\125\004\012\023\033\130\122\141\155\160
```

```
\040\123\145\143\165\162\151\164\171\040\123\145\162\166\151\143
\145\163\040\111\156\143\061\055\060\053\006\003\125\004\003\023
\044\130\122\141\155\160\040\107\154\157\142\141\154\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\020\120\224\154\354\030\352\325\234\115\325\227\357\165\217
\240\255
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Go Daddy Class 2 CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE

CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Go Daddy Class 2 CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\124\150\145\040\107\157
\040\104\141\144\144\171\040\107\162\157\165\160\054\040\111\156
\143\056\061\061\060\057\006\003\125\004\013\023\050\107\157\040
\104\141\144\144\171\040\103\154\141\163\163\040\062\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171
```

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\124\150\145\040\107\157
\040\104\141\144\144\171\040\107\162\157\165\160\054\040\111\156
\143\056\061\061\060\057\006\003\125\004\013\023\050\107\157\040
\104\141\144\144\171\040\103\154\141\163\163\040\062\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\000
```

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\000\060\202\002\350\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061\041
\060\037\006\003\125\004\012\023\030\124\150\145\040\107\157\040
\104\141\144\144\171\040\107\162\157\165\160\054\040\111\156\143
\056\061\061\060\057\006\003\125\004\013\023\050\107\157\040\104
\141\144\144\171\040\103\154\141\163\163\040\062\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\060\036\027\015\060\064\060\066\062\071\061\067
\060\066\062\060\132\027\015\063\064\060\066\062\071\061\067\060
\066\062\060\132\060\143\061\013\060\011\006\003\125\004\006\023
\002\125\123\061\041\060\037\006\003\125\004\012\023\030\124\150
\145\040\107\157\040\104\141\144\144\171\040\107\162\157\165\160
\054\040\111\156\143\056\061\061\060\057\006\003\125\004\013\023
\050\107\157\040\104\141\144\144\171\040\103\154\141\163\163\040
\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\060\202\001\040\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\015
\000\060\202\001\010\002\202\001\001\000\336\235\327\352\127\030
\111\241\133\353\327\137\110\206\352\276\335\377\344\357\147\034
\364\145\150\263\127\161\240\136\167\273\355\233\111\351\160\200
\075\126\030\143\010\157\332\362\314\320\077\177\002\124\042\124
\020\330\262\201\324\300\165\075\113\177\307\167\303\076\170\253
\032\003\265\040\153\057\152\053\261\305\210\176\304\273\036\260
\301\330\105\047\157\252\067\130\367\207\046\327\330\055\366\251
\027\267\037\162\066\116\246\027\077\145\230\222\333\052\156\135
\242\376\210\340\013\336\177\345\215\025\341\353\313\072\325\342
\022\242\023\055\330\216\257\137\022\075\240\010\005\010\266\134
\245\145\070\004\105\231\036\243\140\140\164\305\101\245\162\142
\033\142\305\037\157\137\032\102\276\002\121\145\250\256\043\030
\152\374\170\003\251\115\177\200\303\372\253\132\374\241\100\244
\312\031\026\376\262\310\357\136\163\015\356\167\275\232\366\171
\230\274\261\007\147\242\025\015\335\240\130\306\104\173\012\076
\142\050\137\272\101\007\123\130\317\021\176\070\164\305\370\377
\265\151\220\217\204\164\352\227\033\257\002\001\003\243\201\300
\060\201\275\060\035\006\003\125\035\016\004\026\004\024\322\304
\260\322\221\324\114\021\161\263\141\313\075\241\376\335\250\152
\324\343\060\201\215\006\003\125\035\043\004\201\205\060\201\202
\200\024\322\304\260\322\221\324\114\021\161\263\141\313\075\241
\376\335\250\152\324\343\241\147\244\145\060\143\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\041\060\037\006\003\125
\004\012\023\030\124\150\145\040\107\157\040\104\141\144\144\171
\040\107\162\157\165\160\054\040\111\156\143\056\061\061\060\057
\006\003\125\004\013\023\050\107\157\040\104\141\144\144\171\040
\103\154\141\163\163\040\062\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\202

```
\001\000\060\014\006\003\125\035\023\004\005\060\003\001\001\377
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\062\113\363\262\312\076\221\374\022\306\241\007
\214\216\167\240\063\006\024\134\220\036\030\367\010\246\075\012
\031\371\207\200\021\156\151\344\226\027\060\377\064\221\143\162
\070\356\314\034\001\243\035\224\050\244\061\366\172\304\124\327
\366\345\061\130\003\242\314\316\142\333\224\105\163\265\277\105
\311\044\265\325\202\002\255\043\171\151\215\270\266\115\316\317
\114\312\063\043\350\034\210\252\235\213\101\156\026\311\040\345
\211\236\315\073\332\160\367\176\231\046\040\024\124\045\253\156
\163\205\346\233\041\235\012\154\202\016\250\370\302\014\372\020
\036\154\226\357\207\015\304\017\141\213\255\356\203\053\225\370
\216\222\204\162\071\353\040\352\203\355\203\315\227\156\010\274
\353\116\046\266\163\053\344\323\366\114\376\046\161\342\141\021
\164\112\377\127\032\207\017\165\110\056\317\121\151\027\240\002
\022\141\225\325\321\100\262\020\114\356\304\254\020\103\246\245
\236\012\325\225\142\232\015\317\210\202\305\062\014\344\053\237
\105\346\015\237\050\234\261\271\052\132\127\255\067\017\257\035
\177\333\275\237
```

END

#

Trust for Certificate "Go Daddy Class 2 CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Go Daddy Class 2 CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\047\226\272\346\077\030\001\342\167\046\033\240\327\167\160\002
\217\040\356\344
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\221\336\006\045\253\332\375\062\027\014\273\045\027\052\204\147
```

CKA_ISSUER MULTILINE_OCTAL

```
\060\143\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\124\150\145\040\107\157
\040\104\141\144\144\171\040\107\162\157\165\160\054\040\111\156
\143\056\061\061\060\057\006\003\125\004\013\023\050\107\157\040
\104\141\144\144\171\040\103\154\141\163\163\040\062\040\103\145
\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150
\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\001\000
```

END

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "Starfield Class 2 CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Starfield Class 2 CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\150\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\045\060\043\006\003\125\004\012\023\034\123\164\141\162\146\151
\145\154\144\040\124\145\143\150\156\157\154\157\147\151\145\163
\054\040\111\156\143\056\061\062\060\060\006\003\125\004\013\023
\051\123\164\141\162\146\151\145\154\144\040\103\154\141\163\163
\040\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171
END
```

```
CKA_ID
```

```
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\150\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\045\060\043\006\003\125\004\012\023\034\123\164\141\162\146\151
\145\154\144\040\124\145\143\150\156\157\154\157\147\151\145\163
\054\040\111\156\143\056\061\062\060\060\006\003\125\004\013\023
\051\123\164\141\162\146\151\145\154\144\040\103\154\141\163\163
\040\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

```
\002\001\000
```

```
END
```

```
CKA_VALUE MULTILINE_OCTAL
```

```
\060\202\004\017\060\202\002\367\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\150\061\013\060\011\006\003\125\004\006\023\002\125\123\061\045
\060\043\006\003\125\004\012\023\034\123\164\141\162\146\151\145
\154\144\040\124\145\143\150\156\157\154\157\147\151\145\163\054
\040\111\156\143\056\061\062\060\060\006\003\125\004\013\023\051
\123\164\141\162\146\151\145\154\144\040\103\154\141\163\163\040
\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\060\036\027\015\060\064\060
\066\062\071\061\067\063\071\061\066\132\027\015\063\064\060\066
```


\062\071\061\067\063\071\061\066\132\060\150\061\013\060\011\006
\003\125\004\006\023\002\125\123\061\045\060\043\006\003\125\004
\012\023\034\123\164\141\162\146\151\145\154\144\040\124\145\143
\150\156\157\154\157\147\151\145\163\054\040\111\156\143\056\061
\062\060\060\006\003\125\004\013\023\051\123\164\141\162\146\151
\145\154\144\040\103\154\141\163\163\040\062\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\060\202\001\040\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\015\000\060\202\001\010\002
\202\001\001\000\267\062\310\376\351\161\246\004\205\255\014\021
\144\337\316\115\357\310\003\030\207\077\241\253\373\074\246\237
\360\303\241\332\324\330\156\053\123\220\373\044\244\076\204\360
\236\350\137\354\345\047\104\365\050\246\077\173\336\340\052\360
\310\257\123\057\236\312\005\001\223\036\217\146\034\071\247\115
\372\132\266\163\004\045\146\353\167\177\347\131\306\112\231\045
\024\124\353\046\307\363\177\031\325\060\160\217\257\260\106\052
\377\255\353\051\355\327\237\252\004\207\243\324\371\211\245\064
\137\333\103\221\202\066\331\146\074\261\270\271\202\375\234\072
\076\020\310\073\357\006\145\146\172\233\031\030\075\377\161\121
\074\060\056\137\276\075\167\163\262\135\006\154\303\043\126\232
\053\205\046\222\034\247\002\263\344\077\015\257\010\171\202\270
\066\075\352\234\323\065\263\274\151\312\365\314\235\350\375\144
\215\027\200\063\156\136\112\135\231\311\036\207\264\235\032\300
\325\156\023\065\043\136\337\233\137\075\357\326\367\166\302\352
\076\273\170\015\034\102\147\153\004\330\370\326\332\157\213\362
\104\240\001\253\002\001\003\243\201\305\060\201\302\060\035\006
\003\125\035\016\004\026\004\024\277\137\267\321\316\335\037\206
\364\133\125\254\334\327\020\302\016\251\210\347\060\201\222\006
\003\125\035\043\004\201\212\060\201\207\200\024\277\137\267\321
\316\335\037\206\364\133\125\254\334\327\020\302\016\251\210\347
\241\154\244\152\060\150\061\013\060\011\006\003\125\004\006\023
\002\125\123\061\045\060\043\006\003\125\004\012\023\034\123\164
\141\162\146\151\145\154\144\040\124\145\143\150\156\157\154\157
\147\151\145\163\054\040\111\156\143\056\061\062\060\060\006\003
\125\004\013\023\051\123\164\141\162\146\151\145\154\144\040\103
\154\141\163\163\040\062\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\202\001
\000\060\014\006\003\125\035\023\004\005\060\003\001\001\377\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202
\001\001\000\005\235\077\210\235\321\311\032\125\241\254\151\363
\363\131\332\233\001\207\032\117\127\251\241\171\011\052\333\367
\057\262\036\314\307\136\152\330\203\207\241\227\357\111\065\076
\167\006\101\130\142\277\216\130\270\012\147\077\354\263\335\041
\146\037\311\124\372\162\314\075\114\100\330\201\257\167\236\203
\172\273\242\307\365\064\027\216\331\021\100\364\374\054\052\115
\025\177\247\142\135\056\045\323\000\013\040\032\035\150\371\027
\270\364\275\213\355\050\131\335\115\026\213\027\203\310\262\145
\307\055\172\245\252\274\123\206\155\335\127\244\312\370\040\101

```
\013\150\360\364\373\164\276\126\135\172\171\365\371\035\205\343
\055\225\276\365\161\220\103\314\215\037\232\000\012\207\051\351
\125\042\130\000\043\352\343\022\103\051\133\107\010\335\214\101
\152\145\006\250\345\041\252\101\264\225\041\225\271\175\321\064
\253\023\326\255\274\334\342\075\071\315\275\076\165\160\241\030
\131\003\311\042\264\217\234\325\136\052\327\245\266\324\012\155
\370\267\100\021\106\232\037\171\016\142\277\017\227\354\340\057
\037\027\224
```

END

#

Trust for Certificate

"Starfield Class 2 CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Starfield Class 2 CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\255\176\034\050\260\144\357\217\140\003\100\040\024\303\320\343
\067\016\265\212
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\062\112\113\273\310\143\151\233\276\164\232\306\335\035\106\044
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\150\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\045\060\043\006\003\125\004\012\023\034\123\164\141\162\146\151
\145\154\144\040\124\145\143\150\156\157\154\157\147\151\145\163
\054\040\111\156\143\056\061\062\060\060\006\003\125\004\013\023
\051\123\164\141\162\146\151\145\154\144\040\103\154\141\163\163
\040\062\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\001\000
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "StartCom Certification Authority"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

```
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "StartCom Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\175\061\013\060\011\006\003\125\004\006\023\002\111\114\061
\026\060\024\006\003\125\004\012\023\015\123\164\141\162\164\103
\157\155\040\114\164\144\056\061\053\060\051\006\003\125\004\013
\023\042\123\145\143\165\162\145\040\104\151\147\151\164\141\154
\040\103\145\162\164\151\146\151\143\141\164\145\040\123\151\147
\156\151\156\147\061\051\060\047\006\003\125\004\003\023\040\123
\164\141\162\164\103\157\155\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\175\061\013\060\011\006\003\125\004\006\023\002\111\114\061
\026\060\024\006\003\125\004\012\023\015\123\164\141\162\164\103
\157\155\040\114\164\144\056\061\053\060\051\006\003\125\004\013
\023\042\123\145\143\165\162\145\040\104\151\147\151\164\141\154
\040\103\145\162\164\151\146\151\143\141\164\145\040\123\151\147
\156\151\156\147\061\051\060\047\006\003\125\004\003\023\040\123
\164\141\162\164\103\157\155\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\007\311\060\202\005\261\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\175\061\013\060\011\006\003\125\004\006\023\002\111\114\061\026
\060\024\006\003\125\004\012\023\015\123\164\141\162\164\103\157
\155\040\114\164\144\056\061\053\060\051\006\003\125\004\013\023
\042\123\145\143\165\162\145\040\104\151\147\151\164\141\154\040
\103\145\162\164\151\146\151\143\141\164\145\040\123\151\147\156
\151\156\147\061\051\060\047\006\003\125\004\003\023\040\123\164
\141\162\164\103\157\155\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\036
\027\015\060\066\060\071\061\067\061\071\064\066\063\066\132\027
\015\063\066\060\071\061\067\061\071\064\066\063\066\132\060\175
\061\013\060\011\006\003\125\004\006\023\002\111\114\061\026\060
\024\006\003\125\004\012\023\015\123\164\141\162\164\103\157\155
\040\114\164\144\056\061\053\060\051\006\003\125\004\013\023\042
\123\145\143\165\162\145\040\104\151\147\151\164\141\154\040\103
\145\162\164\151\146\151\143\141\164\145\040\123\151\147\156\151
\156\147\061\051\060\047\006\003\125\004\003\023\040\123\164\141
```

\162\164\103\157\155\040\103\145\162\164\151\146\151\143\141\164
\151\157\156\040\101\165\164\150\157\162\151\164\171\060\202\002
\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\202\002\017\000\060\202\002\012\002\202\002\001\000\301\210
\333\011\274\154\106\174\170\237\225\173\265\063\220\362\162\142
\326\301\066\040\042\044\136\316\351\167\362\103\012\242\006\144
\244\314\216\066\370\070\346\043\360\156\155\261\074\335\162\243
\205\034\241\323\075\264\063\053\323\057\257\376\352\260\101\131
\147\266\304\006\175\012\236\164\205\326\171\114\200\067\172\337
\071\005\122\131\367\364\033\106\103\244\322\205\205\322\303\161
\363\165\142\064\272\054\212\177\036\217\356\355\064\320\021\307
\226\315\122\075\272\063\326\335\115\336\013\073\112\113\237\302
\046\057\372\265\026\034\162\065\167\312\074\135\346\312\341\046
\213\032\066\166\134\001\333\164\024\045\376\355\265\240\210\017
\335\170\312\055\037\007\227\060\001\055\162\171\372\106\326\023
\052\250\271\246\253\203\111\035\345\362\357\335\344\001\216\030
\012\217\143\123\026\205\142\251\016\031\072\314\265\146\246\302
\153\164\007\344\053\341\166\076\264\155\330\366\104\341\163\142
\037\073\304\276\240\123\126\045\154\121\011\367\252\253\312\277
\166\375\155\233\363\235\333\277\075\146\274\014\126\252\257\230
\110\225\072\113\337\247\130\120\331\070\165\251\133\352\103\014
\002\377\231\353\350\154\115\160\133\051\145\234\335\252\135\314
\257\001\061\354\014\353\322\215\350\352\234\173\346\156\367\047
\146\014\032\110\327\156\102\343\077\336\041\076\173\341\015\160
\373\143\252\250\154\032\124\264\134\045\172\311\242\311\213\026
\246\273\054\176\027\136\005\115\130\156\022\035\001\356\022\020
\015\306\062\177\030\377\374\364\372\315\156\221\350\066\111\276
\032\110\151\213\302\226\115\032\022\262\151\027\301\012\220\326
\372\171\042\110\277\272\173\151\370\160\307\372\172\067\330\330
\015\322\166\117\127\377\220\267\343\221\322\335\357\302\140\267
\147\072\335\376\252\234\360\324\213\177\162\042\316\306\237\227
\266\370\257\212\240\020\250\331\373\030\306\266\265\134\122\074
\211\266\031\052\163\001\012\017\003\263\022\140\362\172\057\201
\333\243\156\377\046\060\227\365\213\335\211\127\266\255\075\263
\257\053\305\267\166\002\360\245\326\053\232\206\024\052\162\366
\343\063\214\135\011\113\023\337\273\214\164\023\122\113\002\003
\001\000\001\243\202\002\122\060\202\002\116\060\014\006\003\125
\035\023\004\005\060\003\001\001\377\060\013\006\003\125\035\017
\004\004\003\002\001\256\060\035\006\003\125\035\016\004\026\004
\024\116\013\357\032\244\100\133\245\027\151\207\060\312\064\150
\103\320\101\256\362\060\144\006\003\125\035\037\004\135\060\133
\060\054\240\052\240\050\206\046\150\164\164\160\072\057\057\143
\145\162\164\056\163\164\141\162\164\143\157\155\056\157\162\147
\057\163\146\163\143\141\055\143\162\154\056\143\162\154\060\053
\240\051\240\047\206\045\150\164\164\160\072\057\057\143\162\154
\056\163\164\141\162\164\143\157\155\056\157\162\147\057\163\146
\163\143\141\055\143\162\154\056\143\162\154\060\202\001\135\006
\003\125\035\040\004\202\001\124\060\202\001\120\060\202\001\114

\006\013\053\006\001\004\001\201\265\067\001\001\001\060\202\001
\073\060\057\006\010\053\006\001\005\005\007\002\001\026\043\150
\164\164\160\072\057\057\143\145\162\164\056\163\164\141\162\164
\143\157\155\056\157\162\147\057\160\157\154\151\143\171\056\160
\144\146\060\065\006\010\053\006\001\005\005\007\002\001\026\051
\150\164\164\160\072\057\057\143\145\162\164\056\163\164\141\162
\164\143\157\155\056\157\162\147\057\151\156\164\145\162\155\145
\144\151\141\164\145\056\160\144\146\060\201\320\006\010\053\006
\001\005\005\007\002\002\060\201\303\060\047\026\040\123\164\141
\162\164\040\103\157\155\155\145\162\143\151\141\154\040\050\123
\164\141\162\164\103\157\155\051\040\114\164\144\056\060\003\002
\001\001\032\201\227\114\151\155\151\164\145\144\040\114\151\141
\142\151\154\151\164\171\054\040\162\145\141\144\040\164\150\145
\040\163\145\143\164\151\157\156\040\052\114\145\147\141\154\040
\114\151\155\151\164\141\164\151\157\156\163\052\040\157\146\040
\164\150\145\040\123\164\141\162\164\103\157\155\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\120\157\154\151\143\171\040\141\166\141\151
\154\141\142\154\145\040\141\164\040\150\164\164\160\072\057\057
\143\145\162\164\056\163\164\141\162\164\143\157\155\056\157\162
\147\057\160\157\154\151\143\171\056\160\144\146\060\021\006\011
\140\206\110\001\206\370\102\001\001\004\004\003\002\000\007\060
\070\006\011\140\206\110\001\206\370\102\001\015\004\053\026\051
\123\164\141\162\164\103\157\155\040\106\162\145\145\040\123\123
\114\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\101\165\164\150\157\162\151\164\171\060\015\006\011\052\206\110
\206\367\015\001\001\005\005\000\003\202\002\001\000\026\154\231
\364\146\014\064\365\320\205\136\175\012\354\332\020\116\070\034
\136\337\246\045\005\113\221\062\301\350\073\361\075\335\104\011
\133\007\111\212\051\313\146\002\267\261\232\367\045\230\011\074
\216\033\341\335\066\207\053\113\273\150\323\071\146\075\240\046
\307\362\071\221\035\121\253\202\173\176\325\316\132\344\342\003
\127\160\151\227\010\371\136\130\246\012\337\214\006\232\105\026
\026\070\012\136\127\366\142\307\172\002\005\346\274\036\265\362
\236\364\251\051\203\370\262\024\343\156\050\207\104\303\220\032
\336\070\251\074\254\103\115\144\105\316\335\050\251\134\362\163
\173\004\370\027\350\253\261\363\056\134\144\156\163\061\072\022
\270\274\263\021\344\175\217\201\121\232\073\215\211\364\115\223
\146\173\074\003\355\323\232\035\232\363\145\120\365\240\320\165
\237\057\257\360\352\202\103\230\370\151\234\211\171\304\103\216
\106\162\343\144\066\022\257\367\045\036\070\211\220\167\176\303
\153\152\271\303\313\104\113\254\170\220\213\347\307\054\036\113
\021\104\310\064\122\047\315\012\135\237\205\301\211\325\032\170
\362\225\020\123\062\335\200\204\146\165\331\265\150\050\373\141
\056\276\204\250\070\300\231\022\206\245\036\147\144\255\006\056
\057\251\160\205\307\226\017\174\211\145\365\216\103\124\016\253
\335\245\200\071\224\140\300\064\311\226\160\054\243\022\365\037
\110\173\275\034\176\153\267\235\220\364\042\073\256\370\374\052

```
\312\372\202\122\240\357\257\113\125\223\353\301\265\360\042\213
\254\064\116\046\042\004\241\207\054\165\112\267\345\175\023\327
\270\014\144\300\066\322\311\057\206\022\214\043\011\301\033\202
\073\163\111\243\152\127\207\224\345\326\170\305\231\103\143\343
\115\340\167\055\341\145\231\162\151\004\032\107\011\346\017\001
\126\044\373\037\277\016\171\251\130\056\271\304\011\001\176\225
\272\155\000\006\076\262\352\112\020\071\330\320\053\365\277\354
\165\277\227\002\305\011\033\010\334\125\067\342\201\373\067\204
\103\142\040\312\347\126\113\145\352\376\154\301\044\223\044\241
\064\353\005\377\232\042\256\233\175\077\361\145\121\012\246\060
\152\263\364\210\034\200\015\374\162\212\350\203\136
```

END

#

Trust for Certificate "StartCom Certification Authority"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "StartCom Certification

Authority"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\076\053\367\362\003\033\226\363\214\346\304\330\250\135\076\055
\130\107\152\017
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\042\115\217\212\374\367\065\302\273\127\064\220\173\213\042\026
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\175\061\013\060\011\006\003\125\004\006\023\002\111\114\061
\026\060\024\006\003\125\004\012\023\015\123\164\141\162\164\103
\157\155\040\114\164\144\056\061\053\060\051\006\003\125\004\013
\023\042\123\145\143\165\162\145\040\104\151\147\151\164\141\154
\040\103\145\162\164\151\146\151\143\141\164\145\040\123\151\147
\156\151\156\147\061\051\060\047\006\003\125\004\003\023\040\123
\164\141\162\164\103\157\155\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\001\001
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED

CK_BBOOL CK_FALSE

#

```
# Certificate "Taiwan GRCA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Taiwan GRCA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\077\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\060\060\056\006\003\125\004\012\014\047\107\157\166\145\162\156
\155\145\156\164\040\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\077\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\060\060\056\006\003\125\004\012\014\047\107\157\166\145\162\156
\155\145\156\164\040\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\037\235\131\132\327\057\302\006\104\245\200\010\151\343
\136\366
END
CKA_VALUE
MULTILINE_OCTAL
\060\202\005\162\060\202\003\132\240\003\002\001\002\002\020\037
\235\131\132\327\057\302\006\104\245\200\010\151\343\136\366\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\077
\061\013\060\011\006\003\125\004\006\023\002\124\127\061\060\060
\056\006\003\125\004\012\014\047\107\157\166\145\162\156\155\145
\156\164\040\122\157\157\164\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060
\036\027\015\060\062\061\062\060\065\061\063\062\063\063\063\132
\027\015\063\062\061\062\060\065\061\063\062\063\063\063\132\060
\077\061\013\060\011\006\003\125\004\006\023\002\124\127\061\060
\060\056\006\003\125\004\012\014\047\107\157\166\145\162\156\155
\145\156\164\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001
\000\232\045\270\354\314\242\165\250\173\367\316\133\131\212\311
\321\206\022\010\124\354\234\362\347\106\366\210\363\174\351\245
\337\114\107\066\244\033\001\034\177\036\127\212\215\303\305\321
\041\343\332\044\077\110\053\373\237\056\241\224\347\054\034\223
```

\321\277\033\001\207\123\231\316\247\365\012\041\166\167\377\251
\267\306\163\224\117\106\367\020\111\067\372\250\131\111\135\152
\201\007\126\362\212\371\006\320\367\160\042\115\264\267\101\271
\062\270\261\360\261\303\234\077\160\375\123\335\201\252\330\143
\170\366\330\123\156\241\254\152\204\044\162\124\206\306\322\262
\312\034\016\171\201\326\265\160\142\010\001\056\116\117\016\325
\021\257\251\257\345\232\277\334\314\207\155\046\344\311\127\242
\373\226\371\314\341\077\123\214\154\114\176\233\123\010\013\154
\027\373\147\310\302\255\261\315\200\264\227\334\166\001\026\025
\351\152\327\244\341\170\107\316\206\325\373\061\363\372\061\276
\064\252\050\373\160\114\035\111\307\257\054\235\155\146\246\266
\215\144\176\265\040\152\235\073\201\266\217\100\000\147\113\211
\206\270\314\145\376\025\123\351\004\301\326\137\035\104\327\012
\057\047\232\106\175\241\015\165\255\124\206\025\334\111\073\361
\226\316\017\233\240\354\243\172\135\276\325\052\165\102\345\173
\336\245\266\252\257\050\254\254\220\254\070\267\325\150\065\046
\172\334\367\073\363\375\105\233\321\273\103\170\156\157\361\102
\124\152\230\360\015\255\227\351\122\136\351\325\152\162\336\152
\367\033\140\024\364\245\344\266\161\147\252\037\352\342\115\301
\102\100\376\147\106\027\070\057\107\077\161\234\256\345\041\312
\141\055\155\007\250\204\174\055\356\121\045\361\143\220\236\375
\341\127\210\153\357\212\043\155\261\346\275\077\255\321\075\226
\013\205\215\315\153\047\273\267\005\233\354\273\221\251\012\007
\022\002\227\116\040\220\360\377\015\036\342\101\073\323\100\072
\347\215\135\332\146\344\002\260\007\122\230\134\016\216\063\234
\302\246\225\373\125\031\156\114\216\256\113\017\275\301\070\115
\136\217\204\035\146\315\305\140\226\264\122\132\005\211\216\225
\172\230\301\221\074\225\043\262\016\364\171\264\311\174\301\112
\041\002\003\001\000\001\243\152\060\150\060\035\006\003\125\035
\016\004\026\004\024\314\314\357\314\051\140\244\073\261\222\266
\074\372\062\142\217\254\045\025\073\060\014\006\003\125\035\023
\004\005\060\003\001\001\377\060\071\006\004\147\052\007\000\004
\061\060\057\060\055\002\001\000\060\011\006\005\053\016\003\002
\032\005\000\060\007\006\005\147\052\003\000\000\004\024\003\233
\360\042\023\377\225\050\066\323\334\236\300\062\373\061\072\212
\121\145\060\015\006\011\052\206\110\206\367\015\001\001\005\005
\000\003\202\002\001\000\100\200\112\372\046\311\316\136\060\335
\117\206\164\166\130\365\256\263\203\063\170\244\172\164\027\031
\116\351\122\265\271\340\012\164\142\252\150\312\170\240\114\232
\216\054\043\056\325\152\022\044\277\324\150\323\212\320\330\234
\237\264\037\014\336\070\176\127\070\374\215\342\117\136\014\237
\253\073\322\377\165\227\313\244\343\147\010\377\345\300\026\265
\110\001\175\351\371\012\377\033\345\152\151\277\170\041\250\302
\247\043\251\206\253\166\126\350\016\014\366\023\335\052\146\212
\144\111\075\032\030\207\220\004\237\102\122\267\117\313\376\107
\101\166\065\357\377\000\166\066\105\062\233\306\106\205\135\342
\044\260\036\343\110\226\230\127\107\224\125\172\017\101\261\104
\044\363\301\376\032\153\277\210\375\301\246\332\223\140\136\201


```
\112\231\040\234\110\146\031\265\000\171\124\017\270\054\057\113
\274\251\135\133\140\177\214\207\245\340\122\143\052\276\330\073
\205\100\025\376\036\266\145\077\305\113\332\176\265\172\065\051
\243\056\172\230\140\042\243\364\175\047\116\055\352\264\164\074
\351\017\244\063\017\020\021\274\023\001\326\345\016\323\277\265
\022\242\341\105\043\300\314\010\156\141\267\211\253\203\343\044
\036\346\135\007\347\037\040\076\317\147\310\347\254\060\155\047
\113\150\156\113\052\134\002\010\064\333\370\166\344\147\243\046
\234\077\242\062\302\112\305\201\030\061\020\126\252\204\357\055
\012\377\270\037\167\322\277\245\130\240\142\344\327\113\221\165
\215\211\200\230\176\155\313\123\116\136\257\366\262\227\205\227
\271\332\125\006\271\044\356\327\306\070\036\143\033\022\073\225
\341\130\254\362\337\204\325\137\231\057\015\125\133\346\070\333
\056\077\162\351\110\205\313\273\051\023\217\036\070\125\271\363
\262\304\060\231\043\116\135\362\110\241\022\014\334\022\220\011
\220\124\221\003\074\107\345\325\311\145\340\267\113\175\354\107
\323\263\013\076\255\236\320\164\000\016\353\275\121\255\300\336
\054\300\303\152\376\357\334\013\247\372\106\337\140\333\234\246
\131\120\165\043\151\163\223\262\371\374\002\323\107\346\161\316
\020\002\356\047\214\204\377\254\105\015\023\134\203\062\340\045
\245\206\054\174\364\022
```

END

#

Trust for Certificate "Taiwan GRCA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Taiwan GRCA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\364\213\021\277\336\253\276\224\124\040\161\346\101\336\153\276
\210\053\100\271
```

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

```
\067\205\104\123\062\105\037\040\360\363\225\341\045\304\103\116
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\077\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\060\060\056\006\003\125\004\012\014\047\107\157\166\145\162\156
\155\145\156\164\040\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\020\037\235\131\132\327\057\302\006\104\245\200\010\151\343
\136\366
```

```
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "Firmaprofesional Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL
UTF8 "Firmaprofesional Root CA"
```

```
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\235\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\042\060\040\006\003\125\004\007\023\031\103\057\040\115\165
\156\164\141\156\145\162\040\062\064\064\040\102\141\162\143\145
\154\157\156\141\061\102\060\100\006\003\125\004\003\023\071\101
\165\164\157\162\151\144\141\144\040\144\145\040\103\145\162\164
\151\146\151\143\141\143\151\157\156\040\106\151\162\155\141\160
\162\157\146\145\163\151\157\156\141\154\040\103\111\106\040\101
\066\062\066\063\064\060\066\070\061\046\060\044\006\011\052\206
\110\206\367\015\001\011\001\026\027\143\141\100\146\151\162\155
\141\160\162\157\146\145\163\151\157\156\141\154\056\143\157\155
END
```

```
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\235\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\042\060\040\006\003\125\004\007\023\031\103\057\040\115\165
\156\164\141\156\145\162\040\062\064\064\040\102\141\162\143\145
\154\157\156\141\061\102\060\100\006\003\125\004\003\023\071\101
\165\164\157\162\151\144\141\144\040\144\145\040\103\145\162\164
\151\146\151\143\141\143\151\157\156\040\106\151\162\155\141\160
\162\157\146\145\163\151\157\156\141\154\040\103\111\106\040\101
\066\062\066\063\064\060\066\070\061\046\060\044\006\011\052\206
\110\206\367\015\001\011\001\026\027\143\141\100\146\151\162\155
\141\160\162\157\146\145\163\151\157\156\141\154\056\143\157\155
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
```

```
CKA_VALUE MULTILINE_OCTAL
\060\202\004\127\060\202\003\077\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
```

\201\235\061\013\060\011\006\003\125\004\006\023\002\105\123\061
\042\060\040\006\003\125\004\007\023\031\103\057\040\115\165\156
\164\141\156\145\162\040\062\064\064\040\102\141\162\143\145\154
\157\156\141\061\102\060\100\006\003\125\004\003\023\071\101\165
\164\157\162\151\144\141\144\040\144\145\040\103\145\162\164\151
\146\151\143\141\143\151\157\156\040\106\151\162\155\141\160\162
\157\146\145\163\151\157\156\141\154\040\103\111\106\040\101\066
\062\066\063\064\060\066\070\061\046\060\044\006\011\052\206\110
\206\367\015\001\011\001\026\027\143\141\100\146\151\162\155\141
\160\162\157\146\145\163\151\157\156\141\154\056\143\157\155\060
\036\027\015\060\061\061\060\062\064\062\062\060\060\060\060\132
\027\015\061\063\061\060\062\064\062\062\060\060\060\060\132\060
\201\235\061\013\060\011\006\003\125\004\006\023\002\105\123\061
\042\060\040\006\003\125\004\007\023\031\103\057\040\115\165\156
\164\141\156\145\162\040\062\064\064\040\102\141\162\143\145\154
\157\156\141\061\102\060\100\006\003\125\004\003\023\071\101\165
\164\157\162\151\144\141\144\040\144\145\040\103\145\162\164\151
\146\151\143\141\143\151\157\156\040\106\151\162\155\141\160\162
\157\146\145\163\151\157\156\141\154\040\103\111\106\040\101\066
\062\066\063\064\060\066\070\061\046\060\044\006\011\052\206\110
\206\367\015\001\011\001\026\027\143\141\100\146\151\162\155\141
\160\162\157\146\145\163\151\157\156\141\154\056\143\157\155\060
\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001
\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000
\347\043\003\157\157\043\245\136\170\316\225\054\355\224\036\156
\012\236\001\307\352\060\321\054\235\335\067\350\233\230\171\126
\323\374\163\337\320\212\336\125\217\121\371\132\352\336\265\160
\304\355\244\355\377\243\015\156\017\144\120\061\257\001\047\130
\256\376\154\247\112\057\027\055\323\163\325\023\034\217\131\245
\064\054\035\124\004\105\315\150\270\240\300\003\245\317\205\102
\107\225\050\133\317\357\200\154\340\220\227\212\001\074\035\363
\207\020\060\046\110\175\327\374\351\235\221\161\377\101\232\251
\100\265\067\234\051\040\117\037\122\343\240\175\023\155\124\267
\012\336\351\152\116\007\254\254\031\137\334\176\142\164\366\262
\005\000\272\205\240\375\035\070\156\313\132\273\206\274\224\147
\063\065\203\054\037\043\315\370\310\221\161\314\227\213\357\256
\017\334\051\003\033\300\071\353\160\355\301\156\016\330\147\013
\211\251\274\065\344\357\266\064\264\245\266\304\055\245\276\320
\303\224\044\110\333\337\226\323\000\265\146\032\213\146\005\017
\335\077\077\313\077\252\136\232\112\370\264\112\357\225\067\033
\002\003\001\000\001\243\201\237\060\201\234\060\052\006\003\125
\035\021\004\043\060\041\206\037\150\164\164\160\072\057\057\167
\167\167\056\146\151\162\155\141\160\162\157\146\145\163\151\157
\156\141\154\056\143\157\155\060\022\006\003\125\035\023\001\001
\377\004\010\060\006\001\001\377\002\001\001\060\053\006\003\125
\035\020\004\044\060\042\200\017\062\060\060\061\061\060\062\064
\062\062\060\060\060\060\132\201\017\062\060\061\063\061\060\062
\064\062\062\060\060\060\060\132\060\016\006\003\125\035\017\001

```
\001\377\004\004\003\002\001\006\060\035\006\003\125\035\016\004
\026\004\024\063\013\240\146\321\352\332\316\336\142\223\004\050
\122\265\024\177\070\150\267\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\003\202\001\001\000\107\163\376\215\047
\124\360\365\324\167\234\047\171\127\127\267\025\126\354\307\330
\130\267\001\002\364\063\355\223\120\210\236\174\106\261\275\077
\024\157\361\263\107\110\213\214\227\006\327\352\176\243\134\052
\273\115\057\107\342\370\071\006\311\234\056\061\032\003\170\364
\274\070\306\042\213\063\061\360\026\004\004\175\371\166\344\113
\327\300\346\203\354\131\314\077\336\377\117\153\267\147\176\246
\206\201\062\043\003\235\310\367\137\301\112\140\245\222\251\261
\244\240\140\303\170\207\263\042\363\052\353\133\251\355\005\253
\067\017\261\342\323\225\166\143\126\164\214\130\162\033\067\345
\144\241\276\115\014\223\230\014\227\366\207\155\263\077\347\313
\200\246\355\210\307\137\120\142\002\350\231\164\026\320\346\264
\071\361\047\313\310\100\326\343\206\020\251\043\022\222\340\151
\101\143\247\257\045\013\300\305\222\313\036\230\243\132\272\305
\063\017\240\227\001\335\177\340\173\326\006\124\317\241\342\115
\070\353\113\120\265\313\046\364\312\332\160\112\152\241\342\171
\252\341\247\063\366\375\112\037\366\331\140
```

END

#

Trust for Certificate "Firmaprofesional Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Firmaprofesional Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\251\142\217\113\230\251\033\110\065\272\322\301\106\062\206\273
\146\144\152\214
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\021\222\171\100\074\261\203\100\345\253\146\112\147\222\200\337
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\235\061\013\060\011\006\003\125\004\006\023\002\105\123
\061\042\060\040\006\003\125\004\007\023\031\103\057\040\115\165
\156\164\141\156\145\162\040\062\064\064\040\102\141\162\143\145
\154\157\156\141\061\102\060\100\006\003\125\004\003\023\071\101
\165\164\157\162\151\144\141\144\040\144\145\040\103\145\162\164
\151\146\151\143\141\143\151\157\156\040\106\151\162\155\141\160
\162\157\146\145\163\151\157\156\141\154\040\103\111\106\040\101
\066\062\066\063\064\060\066\070\061\046\060\044\006\011\052\206
\110\206\367\015\001\011\001\026\027\143\141\100\146\151\162\155
\141\160\162\157\146\145\163\151\157\156\141\154\056\143\157\155
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "Wells Fargo Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Wells Fargo Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\127\145\154\154\163
\040\106\141\162\147\157\061\054\060\052\006\003\125\004\013\023
\043\127\145\154\154\163\040\106\141\162\147\157\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\061\057\060\055\006\003\125\004\003\023\046\127
\145\154\154\163\040\106\141\162\147\157\040\122\157\157\164\040
\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150
\157\162\151\164\171
```

```
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\127\145\154\154\163
\040\106\141\162\147\157\061\054\060\052\006\003\125\004\013\023
\043\127\145\154\154\163\040\106\141\162\147\157\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\061\057\060\055\006\003\125\004\003\023\046\127
\145\154\154\163\040\106\141\162\147\157\040\122\157\157\164\040
\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150
\157\162\151\164\171
```

```
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\071\344\227\236
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\345\060\202\002\315\240\003\002\001\002\002\004\071
\344\227\236\060\015\006\011\052\206\110\206\367\015\001\001\005
```

\005\000\060\201\202\061\013\060\011\006\003\125\004\006\023\002
\125\123\061\024\060\022\006\003\125\004\012\023\013\127\145\154
\154\163\040\106\141\162\147\157\061\054\060\052\006\003\125\004
\013\023\043\127\145\154\154\163\040\106\141\162\147\157\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\061\057\060\055\006\003\125\004\003\023
\046\127\145\154\154\163\040\106\141\162\147\157\040\122\157\157
\164\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165
\164\150\157\162\151\164\171\060\036\027\015\060\060\061\060\061
\061\061\066\064\061\062\070\132\027\015\062\061\060\061\061\064
\061\066\064\061\062\070\132\060\201\202\061\013\060\011\006\003
\125\004\006\023\002\125\123\061\024\060\022\006\003\125\004\012
\023\013\127\145\154\154\163\040\106\141\162\147\157\061\054\060
\052\006\003\125\004\013\023\043\127\145\154\154\163\040\106\141
\162\147\157\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\061\057\060\055\006
\003\125\004\003\023\046\127\145\154\154\163\040\106\141\162\147
\157\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141
\164\145\040\101\165\164\150\157\162\151\164\171\060\202\001\042
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\202\001\017\000\060\202\001\012\002\202\001\001\000\325\250\063
\073\046\371\064\377\315\233\176\345\004\107\316\000\342\175\167
\347\061\302\056\047\245\115\150\271\061\272\215\103\131\227\307
\163\252\177\075\134\100\236\005\345\241\342\211\331\114\270\077
\233\371\014\264\310\142\031\054\105\256\221\036\163\161\101\304
\113\023\375\160\302\045\254\042\365\165\013\267\123\344\245\053
\335\316\275\034\072\172\303\367\023\217\046\124\234\026\153\153
\257\373\330\226\261\140\232\110\340\045\042\044\171\064\316\016
\046\000\013\116\253\375\213\316\202\327\057\010\160\150\301\250
\012\371\164\117\007\253\244\371\342\203\176\047\163\164\076\270
\371\070\102\374\245\250\133\110\043\263\353\343\045\262\200\256
\226\324\012\234\302\170\232\306\150\030\256\067\142\067\136\121
\165\250\130\143\300\121\356\100\170\176\250\257\032\240\341\260
\170\235\120\214\173\347\263\374\216\043\260\333\145\000\160\204
\001\010\000\024\156\124\206\232\272\314\371\067\020\366\340\336
\204\055\235\244\205\067\323\207\343\025\320\301\027\220\176\031
\041\152\022\251\166\375\022\002\351\117\041\136\027\002\003\001
\000\001\243\141\060\137\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\114\006\003\125\035\040\004\105
\060\103\060\101\006\013\140\206\110\001\206\373\173\207\007\001
\013\060\062\060\060\006\010\053\006\001\005\005\007\002\001\026
\044\150\164\164\160\072\057\057\167\167\167\056\167\145\154\154
\163\146\141\162\147\157\056\143\157\155\057\143\145\162\164\160
\157\154\151\143\171\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\003\202\001\001\000\322\047\335\234\012\167\053
\273\042\362\002\265\112\112\221\371\321\055\276\344\273\032\150
\357\016\244\000\351\356\347\357\356\366\371\345\164\244\302\330
\122\130\304\164\373\316\153\265\073\051\171\030\132\357\233\355

```
\037\153\066\356\110\045\045\024\266\126\242\020\350\356\247\177
\320\077\243\320\303\135\046\356\007\314\303\301\044\041\207\036
\337\052\022\123\157\101\026\347\355\256\224\372\214\162\372\023
\107\360\074\176\256\175\021\072\023\354\355\372\157\162\144\173
\235\175\177\046\375\172\373\045\255\352\076\051\177\114\343\000
\127\062\260\263\351\355\123\027\331\213\262\024\016\060\350\345
\325\023\306\144\257\304\000\325\330\130\044\374\365\217\354\361
\307\175\245\333\017\047\321\306\362\100\210\346\037\366\141\250
\364\102\310\271\067\323\251\276\054\126\170\302\162\233\131\135
\065\100\212\350\116\143\032\266\351\040\152\121\342\316\244\220
\337\166\160\231\134\160\103\115\267\266\247\031\144\116\222\267
\305\221\074\177\110\026\145\173\026\375\313\374\373\331\325\326
\117\041\145\073\112\177\107\243\373
```

END

#

Trust for Certificate "Wells Fargo Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Wells Fargo Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\223\346\253\042\003\003\265\043\050\334\332\126\236\272\344\321
\321\314\373\145
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\040\013\112\172\210\247\251\102\206\212\137\164\126\173\210\005
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\202\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\024\060\022\006\003\125\004\012\023\013\127\145\154\154\163
\040\106\141\162\147\157\061\054\060\052\006\003\125\004\013\023
\043\127\145\154\154\163\040\106\141\162\147\157\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\061\057\060\055\006\003\125\004\003\023\046\127
\145\154\154\163\040\106\141\162\147\157\040\122\157\157\164\040
\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150
\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\004\071\344\227\236
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

```
#
# Certificate "Swisscom Root CA 1"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Swisscom Root CA 1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\144\061\013\060\011\006\003\125\004\006\023\002\143\150\061
\021\060\017\006\003\125\004\012\023\010\123\167\151\163\163\143
\157\155\061\045\060\043\006\003\125\004\013\023\034\104\151\147
\151\164\141\154\040\103\145\162\164\151\146\151\143\141\164\145
\040\123\145\162\166\151\143\145\163\061\033\060\031\006\003\125
\004\003\023\022\123\167\151\163\163\143\157\155\040\122\157\157
\164\040\103\101\040\061
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\144\061\013\060\011\006\003\125\004\006\023\002\143\150\061
\021\060\017\006\003\125\004\012\023\010\123\167\151\163\163\143
\157\155\061\045\060\043\006\003\125\004\013\023\034\104\151\147
\151\164\141\154\040\103\145\162\164\151\146\151\143\141\164\145
\040\123\145\162\166\151\143\145\163\061\033\060\031\006\003\125
\004\003\023\022\123\167\151\163\163\143\157\155\040\122\157\157
\164\040\103\101\040\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\134\013\205\134\013\347\131\101\337\127\314\077\177\235
\250\066
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\331\060\202\003\301\240\003\002\001\002\002\020\134
\013\205\134\013\347\131\101\337\127\314\077\177\235\250\066\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\144
\061\013\060\011\006\003\125\004\006\023\002\143\150\061\021\060
\017\006\003\125\004\012\023\010\123\167\151\163\163\143\157\155
\061\045\060\043\006\003\125\004\013\023\034\104\151\147\151\164
\141\154\040\103\145\162\164\151\146\151\143\141\164\145\040\123
\145\162\166\151\143\145\163\061\033\060\031\006\003\125\004\003
\023\022\123\167\151\163\163\143\157\155\040\122\157\157\164\040
\103\101\040\061\060\036\027\015\060\065\060\070\061\070\061\062
\060\066\062\060\132\027\015\062\065\060\070\061\070\062\062\060
\066\062\060\132\060\144\061\013\060\011\006\003\125\004\006\023
\002\143\150\061\021\060\017\006\003\125\004\012\023\010\123\167
```


\151\163\163\143\157\155\061\045\060\043\006\003\125\004\013\023
\034\104\151\147\151\164\141\154\040\103\145\162\164\151\146\151
\143\141\164\145\040\123\145\162\166\151\143\145\163\061\033\060
\031\006\003\125\004\003\023\022\123\167\151\163\163\143\157\155
\040\122\157\157\164\040\103\101\040\061\060\202\002\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\002
\017\000\060\202\002\012\002\202\002\001\000\320\271\260\250\014
\331\273\077\041\370\033\325\063\223\200\026\145\040\165\262\075
\233\140\155\106\310\214\061\157\027\303\372\232\154\126\355\074
\305\221\127\303\315\253\226\111\220\052\031\113\036\243\155\127
\335\361\053\142\050\165\105\136\252\326\133\372\013\045\330\241
\026\371\034\304\056\346\225\052\147\314\320\051\156\074\205\064
\070\141\111\261\000\237\326\072\161\137\115\155\316\137\271\251
\344\211\177\152\122\372\312\233\362\334\251\371\235\231\107\077
\116\051\137\264\246\215\135\173\013\231\021\003\003\376\347\333
\333\243\377\035\245\315\220\036\001\037\065\260\177\000\333\220
\157\306\176\173\321\356\172\172\247\252\014\127\157\244\155\305
\023\073\260\245\331\355\062\034\264\136\147\213\124\334\163\207
\345\323\027\174\146\120\162\135\324\032\130\301\331\317\330\211
\002\157\247\111\264\066\135\320\244\336\007\054\266\165\267\050
\221\326\227\276\050\365\230\036\352\133\046\311\275\260\227\163
\332\256\221\046\353\150\301\371\071\025\326\147\113\012\155\117
\313\317\260\344\102\161\214\123\171\347\356\341\333\035\240\156
\035\214\032\167\065\134\026\036\053\123\037\064\213\321\154\374
\362\147\007\172\365\255\355\326\232\253\241\261\113\341\314\067
\137\375\177\315\115\256\270\037\234\103\371\052\130\125\103\105
\274\226\315\160\016\374\311\343\146\272\116\215\073\201\313\025
\144\173\271\224\350\135\063\122\205\161\056\117\216\242\006\021
\121\311\343\313\241\156\061\010\144\014\302\322\074\365\066\350
\327\320\016\170\043\040\221\311\044\052\145\051\133\042\367\041
\316\203\136\244\363\336\113\323\150\217\106\165\134\203\011\156
\051\153\304\160\214\365\235\327\040\057\377\106\322\053\070\302
\057\165\034\075\176\332\245\357\036\140\205\151\102\323\314\370
\143\376\036\103\071\205\246\266\143\101\020\263\163\036\274\323
\372\312\175\026\107\342\247\325\320\243\212\012\010\226\142\126
\156\064\333\331\002\271\060\165\343\004\322\347\217\302\260\021
\100\012\254\325\161\002\142\213\061\276\335\306\043\130\061\102
\103\055\164\371\306\236\246\212\017\351\376\277\203\346\103\127
\044\272\357\106\064\252\327\022\001\070\355\002\003\001\000\001
\243\201\206\060\201\203\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\206\060\035\006\003\125\035\041\004\026\060
\024\060\022\006\007\140\205\164\001\123\000\001\006\007\140\205
\164\001\123\000\001\060\022\006\003\125\035\023\001\001\377\004
\010\060\006\001\001\377\002\001\007\060\037\006\003\125\035\043
\004\030\060\026\200\024\003\045\057\336\157\202\001\072\134\054
\334\053\241\151\265\147\324\214\323\375\060\035\006\003\125\035
\016\004\026\004\024\003\045\057\336\157\202\001\072\134\054\334
\053\241\151\265\147\324\214\323\375\060\015\006\011\052\206\110

```
\206\367\015\001\001\005\005\000\003\202\002\001\000\065\020\313
\354\246\004\015\015\017\315\300\333\253\250\362\210\227\014\337
\223\057\115\174\100\126\061\172\353\244\017\140\315\172\363\276
\303\047\216\003\076\244\335\022\357\176\036\164\006\074\077\061
\362\034\173\221\061\041\264\360\320\154\227\324\351\227\262\044
\126\036\126\303\065\275\210\005\017\133\020\032\144\341\307\202
\060\371\062\255\236\120\054\347\170\005\320\061\261\132\230\212
\165\116\220\134\152\024\052\340\122\107\202\140\346\036\332\201
\261\373\024\013\132\361\237\322\225\272\076\320\033\326\025\035
\243\276\206\325\333\017\300\111\144\273\056\120\031\113\322\044
\370\335\036\007\126\320\070\240\225\160\040\166\214\327\335\036
\336\237\161\304\043\357\203\023\134\243\044\025\115\051\100\074
\152\304\251\330\267\246\104\245\015\364\340\235\167\036\100\160
\046\374\332\331\066\344\171\344\265\077\274\233\145\276\273\021
\226\317\333\306\050\071\072\010\316\107\133\123\132\305\231\376
\135\251\335\357\114\324\306\245\255\002\346\214\007\022\036\157
\003\321\157\240\243\363\051\275\022\307\120\242\260\177\210\251
\231\167\232\261\300\245\071\056\134\174\151\342\054\260\352\067
\152\244\341\132\341\365\120\345\203\357\245\273\052\210\347\214
\333\375\155\136\227\031\250\176\146\165\153\161\352\277\261\307
\157\240\364\216\244\354\064\121\133\214\046\003\160\241\167\325
\001\022\127\000\065\333\043\336\016\212\050\231\375\261\020\157
\113\377\070\055\140\116\054\234\353\147\265\255\111\356\113\037
\254\257\373\015\220\132\146\140\160\135\252\315\170\324\044\356
\310\101\240\223\001\222\234\152\236\374\271\044\305\263\025\202
\176\276\256\225\053\353\261\300\332\343\001\140\013\136\151\254
\204\126\141\276\161\027\376\035\023\017\376\306\207\105\351\376
\062\240\032\015\023\244\224\125\161\245\026\213\272\312\211\260
\262\307\374\217\330\124\265\223\142\235\316\317\131\373\075\030
\316\052\313\065\025\202\135\377\124\042\133\161\122\373\267\311
\376\140\233\000\101\144\360\252\052\354\266\102\103\316\211\146
\201\310\213\237\071\124\003\045\323\026\065\216\204\320\137\372
\060\032\365\232\154\364\016\123\371\072\133\321\034
```

END

#

```
Trust for Certificate "Swisscom Root CA 1"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Swisscom
Root CA 1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\137\072\374\012\213\144\366\206\147\064\164\337\176\251\242\376
\371\372\172\121
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

\370\070\174\167\210\337\054\026\150\056\302\342\122\113\270\371

END

CKA_ISSUER MULTILINE_OCTAL

\060\144\061\013\060\011\006\003\125\004\006\023\002\143\150\061
\021\060\017\006\003\125\004\012\023\010\123\167\151\163\163\143
\157\155\061\045\060\043\006\003\125\004\013\023\034\104\151\147
\151\164\141\154\040\103\145\162\164\151\146\151\143\141\164\145
\040\123\145\162\166\151\143\145\163\061\033\060\031\006\003\125
\004\003\023\022\123\167\151\163\163\143\157\155\040\122\157\157
\164\040\103\101\040\061

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\134\013\205\134\013\347\131\101\337\127\314\077\177\235
\250\066

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED

CK_BBOOL CK_FALSE

#

Certificate "DigiCert Assured ID Root CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "DigiCert Assured ID Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151
\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040
\122\157\157\164\040\103\101

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151
\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040
\122\157\157\164\040\103\101

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\014\347\340\345\027\330\106\376\217\345\140\374\033\360
\060\071

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\267\060\202\002\237\240\003\002\001\002\002\020\014
\347\340\345\027\330\106\376\217\345\140\374\033\360\060\071\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\145
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060
\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164
\040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167
\167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061
\044\060\042\006\003\125\004\003\023\033\104\151\147\151\103\145
\162\164\040\101\163\163\165\162\145\144\040\111\104\040\122\157
\157\164\040\103\101\060\036\027\015\060\066\061\061\061\060\060
\060\060\060\060\060\132\027\015\063\061\061\061\061\060\060\060
\060\060\060\060\132\060\145\061\013\060\011\006\003\125\004\006
\023\002\125\123\061\025\060\023\006\003\125\004\012\023\014\104
\151\147\151\103\145\162\164\040\111\156\143\061\031\060\027\006
\003\125\004\013\023\020\167\167\167\056\144\151\147\151\143\145
\162\164\056\143\157\155\061\044\060\042\006\003\125\004\003\023
\033\104\151\147\151\103\145\162\164\040\101\163\163\165\162\145
\144\040\111\104\040\122\157\157\164\040\103\101\060\202\001\042
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\202\001\017\000\060\202\001\012\002\202\001\001\000\255\016\025
\316\344\103\200\134\261\207\363\267\140\371\161\022\245\256\334
\046\224\210\252\364\316\365\040\071\050\130\140\014\370\200\332
\251\025\225\062\141\074\265\261\050\204\212\212\334\237\012\014
\203\027\172\217\220\254\212\347\171\123\134\061\204\052\366\017
\230\062\066\166\314\336\335\074\250\242\357\152\373\041\362\122
\141\337\237\040\327\037\342\261\331\376\030\144\322\022\133\137
\371\130\030\065\274\107\315\241\066\371\153\177\324\260\070\076
\301\033\303\214\063\331\330\057\030\376\050\017\263\247\203\326
\303\156\104\300\141\065\226\026\376\131\234\213\166\155\327\361
\242\113\015\053\377\013\162\332\236\140\320\216\220\065\306\170
\125\207\040\241\317\345\155\012\310\111\174\061\230\063\154\042
\351\207\320\062\132\242\272\023\202\021\355\071\027\235\231\072
\162\241\346\372\244\331\325\027\061\165\256\205\175\042\256\077
\001\106\206\366\050\171\310\261\332\344\127\027\304\176\034\016
\260\264\222\246\126\263\275\262\227\355\252\247\360\267\305\250
\077\225\026\320\377\241\226\353\010\137\030\167\117\002\003\001
\000\001\243\143\060\141\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\206\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\035\006\003\125\035\016\004\026
\004\024\105\353\242\257\364\222\313\202\061\055\121\213\247\247
\041\235\363\155\310\017\060\037\006\003\125\035\043\004\030\060

```
\026\200\024\105\353\242\257\364\222\313\202\061\055\121\213\247
\247\041\235\363\155\310\017\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\003\202\001\001\000\242\016\274\337\342
\355\360\343\162\163\172\144\224\277\367\162\146\330\062\344\102
\165\142\256\207\353\362\325\331\336\126\263\237\314\316\024\050
\271\015\227\140\134\022\114\130\344\323\075\203\111\105\130\227
\065\151\032\250\107\352\126\306\171\253\022\330\147\201\204\337
\177\011\074\224\346\270\046\054\040\275\075\263\050\211\367\137
\377\042\342\227\204\037\351\145\357\207\340\337\301\147\111\263
\135\353\262\011\052\353\046\355\170\276\175\077\053\363\267\046
\065\155\137\211\001\266\111\133\237\001\005\233\253\075\045\301
\314\266\177\302\361\157\206\306\372\144\150\353\201\055\224\353
\102\267\372\214\036\335\142\361\276\120\147\267\154\275\363\361
\037\153\014\066\007\026\177\067\174\251\133\155\172\361\022\106
\140\203\327\047\004\276\113\316\227\276\303\147\052\150\021\337
\200\347\014\063\146\277\023\015\024\156\363\177\037\143\020\036
\372\215\033\045\155\154\217\245\267\141\001\261\322\243\046\241
\020\161\235\255\342\303\371\303\231\121\267\053\007\010\316\056
\346\120\262\247\372\012\105\057\242\360\362
```

END

#

Trust for Certificate "DigiCert Assured ID Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "DigiCert Assured ID Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\005\143\270\143\015\142\327\132\273\310\253\036\113\337\265\250
\231\262\115\103
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\207\316\013\173\052\016\111\000\341\130\161\233\067\250\223\162
```

CKA_ISSUER MULTILINE_OCTAL

```
\060\145\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\044\060\042\006\003\125\004\003\023\033\104\151\147\151
\103\145\162\164\040\101\163\163\165\162\145\144\040\111\104\040
\122\157\157\164\040\103\101
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\020\014\347\340\345\027\330\106\376\217\345\140\374\033\360
\060\071
```

```
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "DigiCert Global Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert Global Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147\151
\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164
\040\103\101
```

```
END
```

```
CKA_ID
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147\151
\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164
\040\103\101
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\010\073\340\126\220\102\106\261\241\165\152\311\131\221
\307\112
```

```
END
```

```
CKA_VALUE MULTILINE_OCTAL
\060\202\003\257\060\202\002\227\240\003\002\001\002\002\020\010
\073\340\126\220\102\106\261\241\165\152\311\131\221\307\112\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\141
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060
\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164
\040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167
\167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061
\040\060\036\006\003\125\004\003\023\027\104\151\147\151\103\145
```

\162\164\040\107\154\157\142\141\154\040\122\157\157\164\040\103
\101\060\036\027\015\060\066\061\061\061\060\060\060\060\060\060
\060\132\027\015\063\061\061\061\061\060\060\060\060\060\060
\132\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103
\145\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013
\023\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143
\157\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147
\151\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157
\164\040\103\101\060\202\001\042\060\015\006\011\052\206\110\206
\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012
\002\202\001\001\000\342\073\341\021\162\336\250\244\323\243\127
\252\120\242\217\013\167\220\311\242\245\356\022\316\226\133\001
\011\040\314\001\223\247\116\060\267\123\367\103\304\151\000\127
\235\342\215\042\335\207\006\100\000\201\011\316\316\033\203\277
\337\315\073\161\106\342\326\146\307\005\263\166\047\026\217\173
\236\036\225\175\356\267\110\243\010\332\326\257\172\014\071\006
\145\177\112\135\037\274\027\370\253\276\356\050\327\164\177\172
\170\231\131\205\150\156\134\043\062\113\277\116\300\350\132\155
\343\160\277\167\020\277\374\001\366\205\331\250\104\020\130\062
\251\165\030\325\321\242\276\107\342\047\152\364\232\063\370\111
\010\140\213\324\137\264\072\204\277\241\252\112\114\175\076\317
\117\137\154\166\136\240\113\067\221\236\334\042\346\155\316\024
\032\216\152\313\376\315\263\024\144\027\307\133\051\236\062\277
\362\356\372\323\013\102\324\253\267\101\062\332\014\324\357\370
\201\325\273\215\130\077\265\033\350\111\050\242\160\332\061\004
\335\367\262\026\362\114\012\116\007\250\355\112\075\136\265\177
\243\220\303\257\047\002\003\001\000\001\243\143\060\141\060\016
\006\003\125\035\017\001\001\377\004\004\003\002\001\206\060\017
\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060
\035\006\003\125\035\016\004\026\004\024\003\336\120\065\126\321
\114\273\146\360\243\342\033\033\303\227\262\075\321\125\060\037
\006\003\125\035\043\004\030\060\026\200\024\003\336\120\065\126
\321\114\273\146\360\243\342\033\033\303\227\262\075\321\125\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202
\001\001\000\313\234\067\252\110\023\022\012\372\335\104\234\117
\122\260\364\337\256\004\365\171\171\010\243\044\030\374\113\053
\204\300\055\271\325\307\376\364\301\037\130\313\270\155\234\172
\164\347\230\051\253\021\265\343\160\240\241\315\114\210\231\223
\214\221\160\342\253\017\034\276\223\251\377\143\325\344\007\140
\323\243\277\235\133\011\361\325\216\343\123\364\216\143\372\077
\247\333\264\146\337\142\146\326\321\156\101\215\362\055\265\352
\167\112\237\235\130\342\053\131\300\100\043\355\055\050\202\105
\076\171\124\222\046\230\340\200\110\250\067\357\360\326\171\140
\026\336\254\350\016\315\156\254\104\027\070\057\111\332\341\105
\076\052\271\066\123\317\072\120\006\367\056\350\304\127\111\154
\141\041\030\325\004\255\170\074\054\072\200\153\247\353\257\025
\024\351\330\211\301\271\070\154\342\221\154\212\377\144\271\167

```
\045\127\060\300\033\044\243\341\334\351\337\107\174\265\264\044
\010\005\060\354\055\275\013\277\105\277\120\271\251\363\353\230
\001\022\255\310\210\306\230\064\137\215\012\074\306\351\325\225
\225\155\336
END
```

```
#
```

```
Trust for Certificate "DigiCert Global Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert Global Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\250\230\135\072\145\345\345\304\262\327\326\155\100\306\335\057
\261\234\124\066
END
```

```
CKA_CERT_MD5_HASH
MULTILINE_OCTAL
\171\344\251\204\015\175\072\226\327\300\117\342\103\114\211\056
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\141\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\040\060\036\006\003\125\004\003\023\027\104\151\147\151
\103\145\162\164\040\107\154\157\142\141\154\040\122\157\157\164
\040\103\101
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\010\073\340\126\220\102\106\261\241\165\152\311\131\221
\307\112
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "DigiCert High Assurance EV Root CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL
CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert High Assurance EV Root CA"
```


CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\154\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\053\060\051\006\003\125\004\003\023\042\104\151\147\151
\103\145\162\164\040\110\151\147\150\040\101\163\163\165\162\141
\156\143\145\040\105\126\040\122\157\157\164\040\103\101

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\154\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\053\060\051\006\003\125\004\003\023\042\104\151\147\151
\103\145\162\164\040\110\151\147\150\040\101\163\163\165\162\141
\156\143\145\040\105\126\040\122\157\157\164\040\103\101

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\002\254\134\046\152\013\100\233\217\013\171\362\256\106
\045\167

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\305\060\202\002\255\240\003\002\001\002\002\020\002
\254\134\046\152\013\100\233\217\013\171\362\256\106\045\167\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\154
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\025\060
\023\006\003\125\004\012\023\014\104\151\147\151\103\145\162\164
\040\111\156\143\061\031\060\027\006\003\125\004\013\023\020\167
\167\167\056\144\151\147\151\143\145\162\164\056\143\157\155\061
\053\060\051\006\003\125\004\003\023\042\104\151\147\151\103\145
\162\164\040\110\151\147\150\040\101\163\163\165\162\141\156\143
\145\040\105\126\040\122\157\157\164\040\103\101\060\036\027\015
\060\066\061\061\061\060\060\060\060\060\060\060\132\027\015\063
\061\061\061\061\060\060\060\060\060\060\060\132\060\154\061\013
\060\011\006\003\125\004\006\023\002\125\123\061\025\060\023\006
\003\125\004\012\023\014\104\151\147\151\103\145\162\164\040\111
\156\143\061\031\060\027\006\003\125\004\013\023\020\167\167\167
\056\144\151\147\151\143\145\162\164\056\143\157\155\061\053\060
\051\006\003\125\004\003\023\042\104\151\147\151\103\145\162\164
\040\110\151\147\150\040\101\163\163\165\162\141\156\143\145\040
\105\126\040\122\157\157\164\040\103\101\060\202\001\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001
\017\000\060\202\001\012\002\202\001\001\000\306\314\345\163\346
\373\324\273\345\055\055\062\246\337\345\201\077\311\315\045\111

\266\161\052\303\325\224\064\147\242\012\034\260\137\151\246\100
\261\304\267\262\217\320\230\244\251\101\131\072\323\334\224\326
\074\333\164\070\244\112\314\115\045\202\367\112\245\123\022\070
\356\363\111\155\161\221\176\143\266\253\246\137\303\244\204\370
\117\142\121\276\370\305\354\333\070\222\343\006\345\010\221\014
\304\050\101\125\373\313\132\211\025\176\161\350\065\277\115\162
\011\075\276\072\070\120\133\167\061\033\215\263\307\044\105\232
\247\254\155\000\024\132\004\267\272\023\353\121\012\230\101\101
\042\116\145\141\207\201\101\120\246\171\134\211\336\031\112\127
\325\056\346\135\034\123\054\176\230\315\032\006\026\244\150\163
\320\064\004\023\134\241\161\323\132\174\125\333\136\144\341\067
\207\060\126\004\345\021\264\051\200\022\361\171\071\210\242\002
\021\174\047\146\267\210\267\170\362\312\012\250\070\253\012\144
\302\277\146\135\225\204\301\241\045\036\207\135\032\120\013\040
\022\314\101\273\156\013\121\070\270\113\313\002\003\001\000\001
\243\143\060\141\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\206\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024
\261\076\303\151\003\370\277\107\001\324\230\046\032\010\002\357
\143\144\053\303\060\037\006\003\125\035\043\004\030\060\026\200
\024\261\076\303\151\003\370\277\107\001\324\230\046\032\010\002
\357\143\144\053\303\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\003\202\001\001\000\034\032\006\227\334\327\234
\237\074\210\146\006\010\127\041\333\041\107\370\052\147\252\277
\030\062\166\100\020\127\301\212\363\172\331\021\145\216\065\372
\236\374\105\265\236\331\114\061\113\270\221\350\103\054\216\263
\170\316\333\343\123\171\161\326\345\041\224\001\332\125\207\232
\044\144\366\212\146\314\336\234\067\315\250\064\261\151\233\043
\310\236\170\042\053\160\103\343\125\107\061\141\031\357\130\305
\205\057\116\060\366\240\061\026\043\310\347\342\145\026\063\313
\277\032\033\240\075\370\312\136\213\061\213\140\010\211\055\014
\006\134\122\267\304\371\012\230\321\025\137\237\022\276\174\066
\143\070\275\104\244\177\344\046\053\012\304\227\151\015\351\214
\342\300\020\127\270\310\166\022\221\125\362\110\151\330\274\052
\002\133\017\104\324\040\061\333\364\272\160\046\135\220\140\236
\274\113\027\011\057\264\313\036\103\150\311\007\047\301\322\134
\367\352\041\271\150\022\234\074\234\277\236\374\200\134\233\143
\315\354\107\252\045\047\147\240\067\363\000\202\175\124\327\251
\370\351\056\023\243\167\350\037\112

END

#

Trust for Certificate "DigiCert High Assurance EV Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiCert High Assurance EV Root CA"

```

CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\137\267\356\006\063\342\131\333\255\014\114\232\346\323\217\032
\141\307\334\045
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\324\164\336\127\134\071\262\323\234\205\203\305\300\145\111\212
END
CKA_ISSUER MULTILINE_OCTAL
\060\154\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\104\151\147\151\103\145
\162\164\040\111\156\143\061\031\060\027\006\003\125\004\013\023
\020\167\167\167\056\144\151\147\151\143\145\162\164\056\143\157
\155\061\053\060\051\006\003\125\004\003\023\042\104\151\147\151
\103\145\162\164\040\110\151\147\150\040\101\163\163\165\162\141
\156\143\145\040\105\126\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\002\254\134\046\152\013\100\233\217\013\171\362\256\106
\045\167
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Certplus Class 2 Primary CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Certplus Class 2 Primary CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\075\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\021\060\017\006\003\125\004\012\023\010\103\145\162\164\160\154
\165\163\061\033\060\031\006\003\125\004\003\023\022\103\154\141
\163\163\040\062\040\120\162\151\155\141\162\171\040\103\101
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\075\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\021\060\017\006\003\125\004\012\023\010\103\145\162\164\160\154
\165\163\061\033\060\031\006\003\125\004\003\023\022\103\154\141
\163\163\040\062\040\120\162\151\155\141\162\171\040\103\101

```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\021\000\205\275\113\363\330\332\343\151\366\224\327\137\303
\245\104\043

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\222\060\202\002\172\240\003\002\001\002\002\021\000
\205\275\113\363\330\332\343\151\366\224\327\137\303\245\104\043
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\075\061\013\060\011\006\003\125\004\006\023\002\106\122\061\021
\060\017\006\003\125\004\012\023\010\103\145\162\164\160\154\165
\163\061\033\060\031\006\003\125\004\003\023\022\103\154\141\163
\163\040\062\040\120\162\151\155\141\162\171\040\103\101\060\036
\027\015\071\071\060\067\060\067\061\067\060\065\060\060\132\027
\015\061\071\060\067\060\066\062\063\065\071\065\071\132\060\075
\061\013\060\011\006\003\125\004\006\023\002\106\122\061\021\060
\017\006\003\125\004\012\023\010\103\145\162\164\160\154\165\163
\061\033\060\031\006\003\125\004\003\023\022\103\154\141\163\163
\040\062\040\120\162\151\155\141\162\171\040\103\101\060\202\001
\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\202\001\017\000\060\202\001\012\002\202\001\001\000\334\120
\226\320\022\370\065\322\010\170\172\266\122\160\375\157\356\317
\271\021\313\135\167\341\354\351\176\004\215\326\314\157\163\103
\127\140\254\063\012\104\354\003\137\034\200\044\221\345\250\221
\126\022\202\367\340\053\364\333\256\141\056\211\020\215\153\154
\272\263\002\275\325\066\305\110\067\043\342\360\132\067\122\063
\027\022\342\321\140\115\276\057\101\021\343\366\027\045\014\213
\221\300\033\231\173\231\126\015\257\356\322\274\107\127\343\171
\111\173\064\211\047\044\204\336\261\354\351\130\116\376\116\337
\132\276\101\255\254\010\305\030\016\357\322\123\356\154\320\235
\022\001\023\215\334\200\142\367\225\251\104\210\112\161\116\140
\125\236\333\043\031\171\126\007\014\077\143\013\134\260\342\276
\176\025\374\224\063\130\101\070\164\304\341\217\213\337\046\254
\037\265\213\073\267\103\131\153\260\044\246\155\220\213\304\162
\352\135\063\230\267\313\336\136\173\357\224\361\033\076\312\311
\041\301\305\230\002\252\242\366\133\167\233\365\176\226\125\064
\034\147\151\300\361\102\343\107\254\374\050\034\146\125\002\003
\001\000\001\243\201\214\060\201\211\060\017\006\003\125\035\023
\004\010\060\006\001\001\377\002\001\012\060\013\006\003\125\035
\017\004\004\003\002\001\006\060\035\006\003\125\035\016\004\026
\004\024\343\163\055\337\313\016\050\014\336\335\263\244\312\171
\270\216\273\350\060\211\060\021\006\011\140\206\110\001\206\370
\102\001\001\004\004\003\002\001\006\060\067\006\003\125\035\037
\004\060\060\056\060\054\240\052\240\050\206\046\150\164\164\160
\072\057\057\167\167\167\056\143\145\162\164\160\154\165\163\056
\143\157\155\057\103\122\114\057\143\154\141\163\163\062\056\143
\162\154\060\015\006\011\052\206\110\206\367\015\001\001\005\005
\000\003\202\001\001\000\247\124\317\210\104\031\313\337\324\177

```
\000\337\126\063\142\265\367\121\001\220\353\303\077\321\210\104
\351\044\135\357\347\024\275\040\267\232\074\000\376\155\237\333
\220\334\327\364\142\326\213\160\135\347\345\004\110\251\150\174
\311\361\102\363\154\177\305\172\174\035\121\210\272\322\012\076
\047\135\336\055\121\116\323\023\144\151\344\056\343\323\347\233
\011\231\246\340\225\233\316\032\327\177\276\074\316\122\263\021
\025\301\017\027\315\003\273\234\045\025\272\242\166\211\374\006
\361\030\320\223\113\016\174\202\267\245\364\366\137\376\355\100
\246\235\204\164\071\271\334\036\205\026\332\051\033\206\043\000
\311\273\211\176\156\200\210\036\057\024\264\003\044\250\062\157
\003\232\107\054\060\276\126\306\247\102\002\160\033\352\100\330
\272\005\003\160\007\244\226\377\375\110\063\012\341\334\245\201
\220\233\115\335\175\347\347\262\315\134\310\152\225\370\245\366
\215\304\135\170\010\276\173\006\326\111\317\031\066\120\043\056
\010\346\236\005\115\107\030\325\026\351\261\326\266\020\325\273
\227\277\242\216\264\124
```

END

#

Trust for Certificate "Certplus Class 2 Primary CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Certplus Class 2 Primary CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\164\040\164\101\162\234\335\222\354\171\061\330\043\020\215\302
\201\222\342\273
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\210\054\214\122\270\242\074\363\367\273\003\352\256\254\102\013
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\075\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\021\060\017\006\003\125\004\012\023\010\103\145\162\164\160\154
\165\163\061\033\060\031\006\003\125\004\003\023\022\103\154\141
\163\163\040\062\040\120\162\151\155\141\162\171\040\103\101
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\021\000\205\275\113\363\330\332\343\151\366\224\327\137\303
\245\104\043
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

```
#
# Certificate "DST Root CA X3"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DST Root CA X3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\077\061\044\060\042\006\003\125\004\012\023\033\104\151\147
\151\164\141\154\040\123\151\147\156\141\164\165\162\145\040\124
\162\165\163\164\040\103\157\056\061\027\060\025\006\003\125\004
\003\023\016\104\123\124\040\122\157\157\164\040\103\101\040\130
\063
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\077\061\044\060\042\006\003\125\004\012\023\033\104\151\147
\151\164\141\154\040\123\151\147\156\141\164\165\162\145\040\124
\162\165\163\164\040\103\157\056\061\027\060\025\006\003\125\004
\003\023\016\104\123\124\040\122\157\157\164\040\103\101\040\130
\063
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\104\257\260\200\326\243\047\272\211\060\071\206\056\370
\100\153
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\112\060\202\002\062\240\003\002\001\002\002\020\104
\257\260\200\326\243\047\272\211\060\071\206\056\370\100\153\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\077
\061\044\060\042\006\003\125\004\012\023\033\104\151\147\151\164
\141\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165
\163\164\040\103\157\056\061\027\060\025\006\003\125\004\003\023
\016\104\123\124\040\122\157\157\164\040\103\101\040\130\063\060
\036\027\015\060\060\060\071\063\060\062\061\061\062\061\071\132
\027\015\062\061\060\071\063\060\061\064\060\061\061\065\132\060
\077\061\044\060\042\006\003\125\004\012\023\033\104\151\147\151
\164\141\154\040\123\151\147\156\141\164\165\162\145\040\124\162
\165\163\164\040\103\157\056\061\027\060\025\006\003\125\004\003
\023\016\104\123\124\040\122\157\157\164\040\103\101\040\130\063
\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001
\000\337\257\351\227\120\010\203\127\264\314\142\145\366\220\202
\354\307\323\054\153\060\312\133\354\331\303\175\307\100\301\030
\024\213\340\350\063\166\111\052\343\077\041\111\223\254\116\016
```

\257\076\110\313\145\356\374\323\041\017\145\322\052\331\062\217
\214\345\367\167\260\022\173\265\225\300\211\243\251\272\355\163
\056\172\014\006\062\203\242\176\212\024\060\315\021\240\341\052
\070\271\171\012\061\375\120\275\200\145\337\267\121\143\203\310
\342\210\141\352\113\141\201\354\122\153\271\242\342\113\032\050
\237\110\243\236\014\332\011\216\076\027\056\036\335\040\337\133
\306\052\212\253\056\275\160\255\305\013\032\045\220\164\162\305
\173\152\253\064\326\060\211\377\345\150\023\173\124\013\310\326
\256\354\132\234\222\036\075\144\263\214\306\337\277\311\101\160
\354\026\162\325\046\354\070\125\071\103\320\374\375\030\134\100
\361\227\353\325\232\233\215\035\272\332\045\271\306\330\337\301
\025\002\072\253\332\156\361\076\056\365\134\010\234\074\326\203
\151\344\020\233\031\052\266\051\127\343\345\075\233\237\360\002
\135\002\003\001\000\001\243\102\060\100\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125
\035\016\004\026\004\024\304\247\261\244\173\054\161\372\333\341
\113\220\165\377\304\025\140\205\211\020\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\243\032
\054\233\027\000\134\251\036\356\050\146\067\072\277\203\307\077
\113\303\011\240\225\040\135\343\331\131\104\322\076\015\076\275
\212\113\240\164\037\316\020\202\234\164\032\035\176\230\032\335
\313\023\113\263\040\104\344\221\351\314\374\175\245\333\152\345
\376\346\375\340\116\335\267\000\072\265\160\111\257\362\345\353
\002\361\321\002\213\031\313\224\072\136\110\304\030\036\130\031
\137\036\002\132\360\014\361\261\255\251\334\131\206\213\156\351
\221\365\206\312\372\271\146\063\252\131\133\316\342\247\026\163
\107\313\053\314\231\260\067\110\317\343\126\113\365\317\017\014
\162\062\207\306\360\104\273\123\162\155\103\365\046\110\232\122
\147\267\130\253\376\147\166\161\170\333\015\242\126\024\023\071
\044\061\205\242\250\002\132\060\107\341\335\120\007\274\002\011
\220\000\353\144\143\140\233\026\274\210\311\022\346\322\175\221
\213\371\075\062\215\145\264\351\174\261\127\166\352\305\266\050
\071\277\025\145\034\310\366\167\226\152\012\215\167\013\330\221
\013\004\216\007\333\051\266\012\356\235\202\065\065\020

END

#

Trust for Certificate "DST Root CA X3"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "DST Root

CA X3"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\332\311\002\117\124\330\366\337\224\223\137\261\163\046\070\312

\152\327\174\023

```

END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\101\003\122\334\017\367\120\033\026\360\002\216\272\157\105\305
END
CKA_ISSUER MULTILINE_OCTAL
\060\077\061\044\060\042\006\003\125\004\012\023\033\104\151\147
\151\164\141\154\040\123\151\147\156\141\164\165\162\145\040\124
\162\165\163\164\040\103\157\056\061\027\060\025\006\003\125\004
\003\023\016\104\123\124\040\122\157\157\164\040\103\101\040\130
\063
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\104\257\260\200\326\243\047\272\211\060\071\206\056\370
\100\153
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "DST ACES CA X6"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE
CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DST ACES CA X6"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\133\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\061\021\060\017\006\003\125\004\013\023\010\104\123\124\040
\101\103\105\123\061\027\060\025\006\003\125\004\003\023\016\104
\123\124\040\101\103\105\123\040\103\101\040\130\066
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\133\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\104\151\147\151\164\141
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
\164\061\021\060\017\006\003\125\004\013\023\010\104\123\124\040
\101\103\105\123\061\027\060\025\006\003\125\004\003\023\016\104
\123\124\040\101\103\105\123\040\103\101\040\130\066
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL

```


\002\020\015\136\231\012\326\235\267\170\354\330\007\126\073\206
\025\331
END
CKA_VALUE
MULTILINE_OCTAL
\060\202\004\011\060\202\002\361\240\003\002\001\002\002\020\015
\136\231\012\326\235\267\170\354\330\007\126\073\206\025\331\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\133
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\040\060
\036\006\003\125\004\012\023\027\104\151\147\151\164\141\154\040
\123\151\147\156\141\164\165\162\145\040\124\162\165\163\164\061
\021\060\017\006\003\125\004\013\023\010\104\123\124\040\101\103
\105\123\061\027\060\025\006\003\125\004\003\023\016\104\123\124
\040\101\103\105\123\040\103\101\040\130\066\060\036\027\015\060
\063\061\061\062\060\062\061\061\071\065\070\132\027\015\061\067
\061\061\062\060\062\061\061\071\065\070\132\060\133\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\040\060\036\006\003
\125\004\012\023\027\104\151\147\151\164\141\154\040\123\151\147
\156\141\164\165\162\145\040\124\162\165\163\164\061\021\060\017
\006\003\125\004\013\023\010\104\123\124\040\101\103\105\123\061
\027\060\025\006\003\125\004\003\023\016\104\123\124\040\101\103
\105\123\040\103\101\040\130\066\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\271\075\365\054\311\224\334
\165\212\225\135\143\350\204\167\166\146\271\131\221\134\106\335
\222\076\237\371\016\003\264\075\141\222\275\043\046\265\143\356
\222\322\236\326\074\310\015\220\137\144\201\261\250\010\015\114
\330\371\323\005\050\122\264\001\045\305\225\034\014\176\076\020
\204\165\317\301\031\221\143\317\350\250\221\210\271\103\122\273
\200\261\125\211\213\061\372\320\267\166\276\101\075\060\232\244
\042\045\027\163\350\036\342\323\254\052\275\133\070\041\325\052
\113\327\125\175\343\072\125\275\327\155\153\002\127\153\346\107
\174\010\310\202\272\336\247\207\075\241\155\270\060\126\302\263
\002\201\137\055\365\342\232\060\030\050\270\146\323\313\001\226
\157\352\212\105\125\326\340\235\377\147\053\027\002\246\116\032
\152\021\013\176\267\173\347\230\326\214\166\157\301\073\333\120
\223\176\345\320\216\037\067\270\275\272\306\237\154\351\174\063
\362\062\074\046\107\372\047\044\002\311\176\035\133\210\102\023
\152\065\174\175\065\351\056\146\221\162\223\325\062\046\304\164
\365\123\243\263\135\232\366\011\313\002\003\001\000\001\243\201
\310\060\201\305\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377\004
\004\003\002\001\306\060\037\006\003\125\035\021\004\030\060\026
\201\024\160\153\151\055\157\160\163\100\164\162\165\163\164\144
\163\164\056\143\157\155\060\142\006\003\125\035\040\004\133\060
\131\060\127\006\012\140\206\110\001\145\003\002\001\001\001\060
\111\060\107\006\010\053\006\001\005\005\007\002\001\026\073\150
\164\164\160\072\057\057\167\167\167\056\164\162\165\163\164\144

```
\163\164\056\143\157\155\057\143\145\162\164\151\146\151\143\141
\164\145\163\057\160\157\154\151\143\171\057\101\103\105\123\055
\151\156\144\145\170\056\150\164\155\154\060\035\006\003\125\035
\016\004\026\004\024\011\162\006\116\030\103\017\345\326\314\303
\152\213\061\173\170\217\250\203\270\060\015\006\011\052\206\110
\206\367\015\001\001\005\005\000\003\202\001\001\000\243\330\216
\326\262\333\316\005\347\062\315\001\323\004\003\345\166\344\126
\053\234\231\220\350\010\060\154\337\175\075\356\345\277\265\044
\100\204\111\341\321\050\256\304\302\072\123\060\210\361\365\167
\156\121\312\372\377\231\257\044\137\033\240\375\362\254\204\312
\337\251\360\137\004\056\255\026\277\041\227\020\201\075\343\377
\207\215\062\334\224\345\107\212\136\152\023\311\224\225\075\322
\356\310\064\225\320\200\324\255\062\010\200\124\074\340\275\122
\123\327\122\174\262\151\077\177\172\317\152\164\312\372\004\052
\234\114\132\006\245\351\040\255\105\146\017\151\361\335\277\351
\343\062\213\372\340\301\206\115\162\074\056\330\223\170\012\052
\370\330\322\047\075\031\211\137\132\173\212\073\314\014\332\121
\256\307\013\367\053\260\067\005\354\274\127\043\342\070\322\233
\150\363\126\022\210\117\102\174\270\061\304\265\333\344\310\041
\064\351\110\021\065\356\372\307\222\127\305\237\064\344\307\366
\367\016\013\114\234\150\170\173\161\061\307\353\036\340\147\101
\363\267\240\247\315\345\172\063\066\152\372\232\053
```

END

#

Trust for Certificate "DST ACES CA X6"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "DST ACES CA X6"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\100\124\332\157\034\077\100\164\254\355\017\354\315\333\171\321
```

```
\123\373\220\035
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\041\330\114\202\053\231\011\063\242\353\024\044\215\216\137\350
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\133\061\013\060\011\006\003\125\004\006\023\002\125\123\061
```

```
\040\060\036\006\003\125\004\012\023\027\104\151\147\151\164\141
```

```
\154\040\123\151\147\156\141\164\165\162\145\040\124\162\165\163
```

```
\164\061\021\060\017\006\003\125\004\013\023\010\104\123\124\040
```

```
\101\103\105\123\061\027\060\025\006\003\125\004\003\023\016\104
```

```
\123\124\040\101\103\105\123\040\103\101\040\130\066
```

END

CKA_SERIAL_NUMBER

```
MULTILINE_OCTAL
\002\020\015\136\231\012\326\235\267\170\354\330\007\126\073\206
\025\331
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "TURKTRUST Certificate Services Provider Root 1"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TURKTRUST Certificate Services Provider Root 1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

```
\060\201\267\061\077\060\075\006\003\125\004\003\014\066\124\303
\234\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157
\156\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151
\172\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304
\261\163\304\261\061\013\060\011\006\003\125\004\006\014\002\124
\122\061\017\060\015\006\003\125\004\007\014\006\101\116\113\101
\122\101\061\126\060\124\006\003\125\004\012\014\115\050\143\051
\040\062\060\060\065\040\124\303\234\122\113\124\122\125\123\124
\040\102\151\154\147\151\040\304\260\154\145\164\151\305\237\151
\155\040\166\145\040\102\151\154\151\305\237\151\155\040\107\303
\274\166\145\156\154\151\304\237\151\040\110\151\172\155\145\164
\154\145\162\151\040\101\056\305\236\056
```

```
END
```

```
CKA_ID
UTF8 "0"
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\267\061\077\060\075\006\003\125\004\003\014\066\124\303
\234\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157
\156\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151
\172\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304
\261\163\304\261\061\013\060\011\006\003\125\004\006\014\002\124
\122\061\017\060\015\006\003\125\004\007\014\006\101\116\113\101
\122\101\061\126\060\124\006\003\125\004\012\014\115\050\143\051
\040\062\060\060\065\040\124\303\234\122\113\124\122\125\123\124
\040\102\151\154\147\151\040\304\260\154\145\164\151\305\237\151
\155\040\166\145\040\102\151\154\151\305\237\151\155\040\107\303
\274\166\145\156\154\151\304\237\151\040\110\151\172\155\145\164
\154\145\162\151\040\101\056\305\236\056
```

```
END
```

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\373\060\202\002\343\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\201\267\061\077\060\075\006\003\125\004\003\014\066\124\303\234
\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157\156
\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151\172
\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304\261
\163\304\261\061\013\060\011\006\003\125\004\006\014\002\124\122
\061\017\060\015\006\003\125\004\007\014\006\101\116\113\101\122
\101\061\126\060\124\006\003\125\004\012\014\115\050\143\051\040
\062\060\060\065\040\124\303\234\122\113\124\122\125\123\124\040
\102\151\154\147\151\040\304\260\154\145\164\151\305\237\151\155
\040\166\145\040\102\151\154\151\305\237\151\155\040\107\303\274
\166\145\156\154\151\304\237\151\040\110\151\172\155\145\164\154
\145\162\151\040\101\056\305\236\056\060\036\027\015\060\065\060
\065\061\063\061\060\062\067\061\067\132\027\015\061\065\060\063
\062\062\061\060\062\067\061\067\132\060\201\267\061\077\060\075
\006\003\125\004\003\014\066\124\303\234\122\113\124\122\125\123
\124\040\105\154\145\153\164\162\157\156\151\153\040\123\145\162
\164\151\146\151\153\141\040\110\151\172\155\145\164\040\123\141
\304\237\154\141\171\304\261\143\304\261\163\304\261\061\013\060
\011\006\003\125\004\006\014\002\124\122\061\017\060\015\006\003
\125\004\007\014\006\101\116\113\101\122\101\061\126\060\124\006
\003\125\004\012\014\115\050\143\051\040\062\060\060\065\040\124
\303\234\122\113\124\122\125\123\124\040\102\151\154\147\151\040
\304\260\154\145\164\151\305\237\151\155\040\166\145\040\102\151
\154\151\305\237\151\155\040\107\303\274\166\145\156\154\151\304
\237\151\040\110\151\172\155\145\164\154\145\162\151\040\101\056
\305\236\056\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002
\202\001\001\000\312\122\005\326\143\003\330\034\137\335\322\173
\135\362\014\140\141\133\153\073\164\053\170\015\175\105\275\042
\164\350\214\003\301\306\021\052\075\225\274\251\224\260\273\221
\227\310\151\174\204\305\264\221\154\154\023\152\244\125\255\244
\205\350\225\176\263\000\257\000\302\005\030\365\160\235\066\213
\256\313\344\033\201\177\223\210\373\152\125\273\175\205\222\316
\272\130\237\333\062\305\275\135\357\042\112\057\101\007\176\111
\141\263\206\354\116\246\101\156\204\274\003\354\365\073\034\310
\037\302\356\250\356\352\022\112\215\024\317\363\012\340\120\071
\371\010\065\370\021\131\255\347\042\352\113\312\024\006\336\102
\272\262\231\363\055\124\210\020\006\352\341\032\076\075\147\037
\373\316\373\174\202\350\021\135\112\301\271\024\352\124\331\146
\233\174\211\175\004\232\142\311\351\122\074\236\234\357\322\365
\046\344\346\345\030\174\213\156\337\154\314\170\133\117\162\262

```
\313\134\077\214\005\215\321\114\214\255\222\307\341\170\177\145
\154\111\006\120\054\236\062\302\327\112\306\165\212\131\116\165
\157\107\136\301\002\003\001\000\001\243\020\060\016\060\014\006
\003\125\035\023\004\005\060\003\001\001\377\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000\025
\365\125\377\067\226\200\131\041\244\374\241\025\114\040\366\324
\137\332\003\044\374\317\220\032\364\041\012\232\356\072\261\152
\357\357\370\140\321\114\066\146\105\035\363\146\002\164\004\173
\222\060\250\336\012\166\017\357\225\156\275\311\067\346\032\015
\254\211\110\133\314\203\066\302\365\106\134\131\202\126\264\325
\376\043\264\330\124\034\104\253\304\247\345\024\316\074\101\141
\174\103\346\315\304\201\011\213\044\373\124\045\326\026\250\226
\014\147\007\157\263\120\107\343\034\044\050\335\052\230\244\141
\376\333\352\022\067\274\001\032\064\205\275\156\117\347\221\162
\007\104\205\036\130\312\124\104\335\367\254\271\313\211\041\162
\333\217\300\151\051\227\052\243\256\030\043\227\034\101\052\213
\174\052\301\174\220\350\251\050\300\323\221\306\255\050\207\100
\150\265\377\354\247\322\323\070\030\234\323\175\151\135\360\306
\245\036\044\033\243\107\374\151\007\150\347\344\232\264\355\017
\241\207\207\002\316\207\322\110\116\341\274\377\313\361\162\222
\104\144\003\045\352\336\133\156\237\311\362\116\254\335\307
END
```

#

```
Trust for Certificate "TURKTRUST Certificate Services Provider Root 1"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TURKTRUST Certificate Services Provider Root 1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\171\230\243\010\341\115\145\205\346\302\036\025\072\161\237\272
\132\323\112\331
END
CKA_CERT_MD5_HASH
MULTILINE_OCTAL
\361\152\042\030\311\315\337\316\202\035\035\267\170\134\251\245
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\267\061\077\060\075\006\003\125\004\003\014\066\124\303
\234\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157
\156\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151
\172\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304
\261\163\304\261\061\013\060\011\006\003\125\004\006\014\002\124
\122\061\017\060\015\006\003\125\004\007\014\006\101\116\113\101
\122\101\061\126\060\124\006\003\125\004\012\014\115\050\143\051
\040\062\060\060\065\040\124\303\234\122\113\124\122\125\123\124
\040\102\151\154\147\151\040\304\260\154\145\164\151\305\237\151
```

```

\155\040\166\145\040\102\151\154\151\305\237\151\155\040\107\303
\274\166\145\156\154\151\304\237\151\040\110\151\172\155\145\164
\154\145\162\151\040\101\056\305\236\056
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST
CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "TURKTRUST Certificate Services Provider Root 2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TURKTRUST Certificate Services Provider Root 2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\276\061\077\060\075\006\003\125\004\003\014\066\124\303
\234\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157
\156\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151
\172\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304
\261\163\304\261\061\013\060\011\006\003\125\004\006\023\002\124
\122\061\017\060\015\006\003\125\004\007\014\006\101\156\153\141
\162\141\061\135\060\133\006\003\125\004\012\014\124\124\303\234
\122\113\124\122\125\123\124\040\102\151\154\147\151\040\304\260
\154\145\164\151\305\237\151\155\040\166\145\040\102\151\154\151
\305\237\151\155\040\107\303\274\166\145\156\154\151\304\237\151
\040\110\151\172\155\145\164\154\145\162\151\040\101\056\305\236
\056\040\050\143\051\040\113\141\163\304\261\155\040\062\060\060
\065
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\276\061\077\060\075\006\003\125\004\003\014\066\124\303
\234\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157
\156\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151
\172\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304
\261\163\304\261\061\013\060\011\006\003\125\004\006\023\002\124
\122\061\017\060\015\006\003\125\004\007\014\006\101\156\153\141
\162\141\061\135\060\133\006\003\125\004\012\014\124\124\303\234
\122\113\124\122\125\123\124\040\102\151\154\147\151\040\304\260

```

\154\145\164\151\305\237\151\155\040\166\145\040\102\151\154\151
\305\237\151\155\040\107\303\274\166\145\156\154\151\304\237\151
\040\110\151\172\155\145\164\154\145\162\151\040\101\056\305\236
\056\040\050\143\051\040\113\141\163\304\261\155\040\062\060\060
\065

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\074\060\202\003\044\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\201\276\061\077\060\075\006\003\125\004\003\014\066\124\303\234
\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157\156
\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151\172
\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304\261
\163\304\261\061\013\060\011\006\003\125\004\006\023\002\124\122
\061\017\060\015\006\003\125\004\007\014\006\101\156\153\141\162
\141\061\135\060\133\006\003\125\004\012\014\124\124\303\234\122
\113\124\122\125\123\124\040\102\151\154\147\151\040\304\260\154
\145\164\151\305\237\151\155\040\166\145\040\102\151\154\151\305
\237\151\155\040\107\303\274\166\145\156\154\151\304\237\151\040
\110\151\172\155\145\164\154\145\162\151\040\101\056\305\236\056
\040\050\143\051\040\113\141\163\304\261\155\040\062\060\060\065
\060\036\027\015\060\065\061\061\060\067\061\060\060\067\065\067
\132\027\015\061\065\060\071\061\066\061\060\060\067\065\067\132
\060\201\276\061\077\060\075\006\003\125\004\003\014\066\124\303
\234\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157
\156\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151
\172\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304
\261\163\304\261\061\013\060\011\006\003\125\004\006\023\002\124
\122\061\017\060\015\006\003\125\004\007\014\006\101\156\153\141
\162\141\061\135\060\133\006\003\125\004\012\014\124\124\303\234
\122\113\124\122\125\123\124\040\102\151\154\147\151\040\304\260
\154\145\164\151\305\237\151\155\040\166\145\040\102\151\154\151
\305\237\151\155\040\107\303\274\166\145\156\154\151\304\237\151
\040\110\151\172\155\145\164\154\145\162\151\040\101\056\305\236
\056\040\050\143\051\040\113\141\163\304\261\155\040\062\060\060
\065\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001
\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001
\001\000\251\066\176\303\221\103\114\303\031\230\010\310\307\130
\173\117\026\214\245\316\111\001\037\163\016\254\165\023\246\372
\236\054\040\336\330\220\016\012\321\151\322\047\373\252\167\237
\047\122\045\342\313\135\330\330\203\120\027\175\212\265\202\077
\004\216\264\325\360\111\247\144\267\036\056\137\040\234\120\165
\117\257\341\265\101\024\364\230\222\210\307\345\345\144\107\141
\107\171\375\300\121\361\301\231\347\334\316\152\373\257\265\001

\060\334\106\034\357\212\354\225\357\334\377\257\020\034\353\235
\330\260\252\152\205\030\015\027\311\076\277\361\233\320\011\211
\102\375\240\102\264\235\211\121\125\051\317\033\160\274\204\124
\255\301\023\037\230\364\056\166\140\213\135\077\232\255\312\014
\277\247\126\133\217\167\270\325\236\171\111\222\077\340\361\227
\044\172\154\233\027\017\155\357\123\230\221\053\344\017\276\131
\171\007\170\273\227\225\364\237\151\324\130\207\012\251\343\314
\266\130\031\237\046\041\261\304\131\215\262\101\165\300\255\151
\316\234\000\010\362\066\377\076\360\241\017\032\254\024\375\246
\140\017\002\003\001\000\001\243\103\060\101\060\035\006\003\125
\035\016\004\026\004\024\331\067\263\116\005\375\331\317\237\022
\026\256\266\211\057\353\045\072\210\034\060\017\006\003\125\035
\017\001\001\377\004\005\003\003\007\006\000\060\017\006\003\125
\035\023\001\001\377\004\005\060\003\001\001\377\060\015\006\011
\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000
\162\140\226\267\311\334\330\051\136\043\205\137\262\263\055\166
\373\210\327\027\376\173\155\105\270\366\205\154\237\042\374\052
\020\042\354\252\271\060\366\253\130\326\071\020\061\231\051\000
\275\211\146\101\373\164\336\221\301\030\013\237\265\141\313\235
\072\276\365\250\224\243\042\125\156\027\111\377\322\051\361\070
\046\135\357\245\252\072\371\161\173\346\332\130\035\323\164\302
\001\372\076\151\130\137\255\313\150\276\024\056\233\154\300\266
\334\240\046\372\167\032\342\044\332\032\067\340\147\255\321\163
\203\015\245\032\035\156\022\222\176\204\142\000\027\275\274\045
\030\127\362\327\251\157\131\210\274\064\267\056\205\170\235\226
\334\024\303\054\212\122\233\226\214\122\146\075\206\026\213\107
\270\121\011\214\352\175\315\210\162\263\140\063\261\360\012\104
\357\017\365\011\067\210\044\016\054\153\040\072\242\372\021\362
\100\065\234\104\150\143\073\254\063\157\143\274\054\273\362\322
\313\166\175\175\210\330\035\310\005\035\156\274\224\251\146\214
\167\161\307\372\221\372\057\121\236\351\071\122\266\347\004\102
END

#

Trust for Certificate "TURKTRUST Certificate Services Provider Root 2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "TURKTRUST Certificate Services Provider Root 2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\264\065\324\341\021\235\034\146\220\247\111\353\263\224\275\143

\173\247\202\267

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

\067\245\156\324\261\045\204\227\267\375\126\025\172\371\242\000

END


```
CKA_ISSUER MULTILINE_OCTAL
\060\201\276\061\077\060\075\006\003\125\004\003\014\066\124\303
\234\122\113\124\122\125\123\124\040\105\154\145\153\164\162\157
\156\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151
\172\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304
\261\163\304\261\061\013\060\011\006\003\125\004\006\023\002\124
\122\061\017\060\015\006\003\125\004\007\014\006\101\156\153\141
\162\141\061\135\060\133\006\003\125\004\012\014\124\124\303\234
\122\113\124\122\125\123\124\040\102\151\154\147\151\040\304\260
\154\145\164\151\305\237\151\155\040\166\145\040\102\151\154\151
\305\237\151\155\040\107\303\274\166\145\156\154\151\304\237\151
\040\110\151\172\155\145\164\154\145\162\151\040\101\056\305\236
\056\040\050\143\051\040\113\141\163\304\261\155\040\062\060\060
\065
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "SwissSign Platinum CA - G2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SwissSign Platinum CA - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\111\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\043\060\041\006\003\125\004\003\023
\032\123\167\151\163\163\123\151\147\156\040\120\154\141\164\151
\156\165\155\040\103\101\040\055\040\107\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\111\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\043\060\041\006\003\125\004\003\023
\032\123\167\151\163\163\123\151\147\156\040\120\154\141\164\151
\156\165\155\040\103\101\040\055\040\107\062
END
```

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\010\116\262\000\147\014\003\135\117

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\301\060\202\003\251\240\003\002\001\002\002\010\116
\262\000\147\014\003\135\117\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\060\111\061\013\060\011\006\003\125\004
\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014
\123\167\151\163\163\123\151\147\156\040\101\107\061\043\060\041
\006\003\125\004\003\023\032\123\167\151\163\163\123\151\147\156
\040\120\154\141\164\151\156\165\155\040\103\101\040\055\040\107
\062\060\036\027\015\060\066\061\060\062\065\060\070\063\066\060
\060\132\027\015\063\066\061\060\062\065\060\070\063\066\060\060
\132\060\111\061\013\060\011\006\003\125\004\006\023\002\103\110
\061\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163
\123\151\147\156\040\101\107\061\043\060\041\006\003\125\004\003
\023\032\123\167\151\163\163\123\151\147\156\040\120\154\141\164
\151\156\165\155\040\103\101\040\055\040\107\062\060\202\002\042
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\202\002\017\000\060\202\002\012\002\202\002\001\000\312\337\242
\002\342\332\370\374\007\026\261\336\140\252\336\226\134\144\037
\307\057\176\317\147\372\104\102\326\166\143\225\256\353\257\162
\040\212\105\107\206\142\170\206\326\040\071\046\364\256\243\375
\043\347\245\234\265\042\041\031\267\067\223\042\300\120\234\202
\173\324\325\004\104\134\313\264\302\237\222\276\044\330\173\147
\042\342\151\137\345\005\170\324\207\331\161\160\063\045\123\264
\207\073\051\220\050\066\232\125\104\060\150\244\203\227\177\015
\036\234\166\377\025\235\140\227\000\215\212\205\003\354\200\276
\352\054\156\020\121\222\314\176\325\243\063\330\326\111\336\130
\052\257\366\026\353\113\173\220\062\227\271\272\235\130\361\370
\127\111\004\036\242\135\006\160\335\161\333\371\335\213\232\033
\214\317\075\243\115\316\313\174\366\273\234\240\372\011\316\043
\142\262\351\015\037\342\162\050\217\237\254\150\040\175\157\073
\250\205\061\011\177\013\307\350\145\351\343\170\016\011\147\060
\213\064\202\373\135\340\314\235\201\155\142\356\010\036\004\054
\116\233\354\376\251\117\137\375\151\170\357\011\037\241\264\277
\372\363\357\220\036\114\005\213\036\352\172\221\172\303\327\345
\373\060\274\154\033\020\130\230\367\032\137\320\051\062\003\023
\106\115\141\152\205\114\122\164\057\006\037\173\021\342\204\227
\306\231\363\155\177\327\147\203\176\023\150\330\161\050\132\330
\316\335\350\020\024\232\376\155\043\207\156\216\132\160\074\325
\215\011\000\247\252\274\260\061\067\155\310\204\024\036\133\275
\105\143\040\153\113\164\214\275\333\072\016\301\317\132\026\217
\245\230\362\166\211\262\023\022\073\013\167\167\254\273\345\074
\051\112\222\162\312\141\032\053\136\114\342\203\164\167\372\065
\110\172\205\115\215\232\123\304\337\170\312\227\221\110\053\105
\053\001\367\034\032\242\355\030\272\012\275\203\372\157\274\215

\127\223\073\324\324\246\316\036\361\240\261\316\253\375\053\050
\232\117\033\327\303\162\333\244\304\277\135\114\365\335\173\226
\151\356\150\200\346\347\230\272\066\267\376\156\355\053\275\040
\370\145\031\332\125\011\176\045\334\376\141\142\162\371\176\030
\002\357\143\264\320\373\257\345\073\143\214\147\217\002\003\001
\000\001\243\201\254\060\201\251\060\016\006\003\125\035\017\001
\001\377\004\004\003\002\001\006\060\017\006\003\125\035\023\001
\001\377\004\005\060\003\001\001\377\060\035\006\003\125\035\016
\004\026\004\024\120\257\314\007\207\025\107\157\070\305\264\145
\321\336\225\252\351\337\234\314\060\037\006\003\125\035\043\004
\030\060\026\200\024\120\257\314\007\207\025\107\157\070\305\264
\145\321\336\225\252\351\337\234\314\060\106\006\003\125\035\040
\004\077\060\075\060\073\006\011\140\205\164\001\131\001\001\001
\001\060\056\060\054\006\010\053\006\001\005\005\007\002\001\026
\040\150\164\164\160\072\057\057\162\145\160\157\163\151\164\157
\162\171\056\163\167\151\163\163\163\151\147\156\056\143\157\155
\057\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\202\002\001\000\010\205\246\365\026\014\374\104\032\301\143
\340\371\125\106\010\374\160\034\102\050\226\216\267\305\301\101
\165\116\011\161\171\345\155\226\312\113\245\210\140\320\060\164
\270\312\010\334\264\060\236\100\007\026\153\145\225\167\001\256
\244\267\065\013\201\332\161\025\251\164\027\070\173\130\312\371
\057\373\300\145\166\215\133\001\271\175\336\202\075\144\270\276
\024\164\243\012\124\323\054\225\030\027\065\365\121\153\077\217
\242\226\141\071\170\153\113\345\246\240\370\123\337\121\020\223
\142\347\200\057\342\321\340\274\216\066\106\167\063\354\270\373
\216\232\054\211\115\061\021\017\046\236\004\273\267\004\215\013
\362\271\374\132\235\073\026\267\057\310\230\253\376\212\120\131
\056\243\073\374\051\135\213\301\113\311\342\212\023\035\261\277
\273\102\035\122\335\116\330\024\136\020\306\061\007\357\161\047
\367\033\071\011\334\202\352\213\263\225\206\136\375\365\332\135
\061\246\340\061\266\224\346\104\111\164\305\026\345\367\037\003
\141\050\305\310\313\022\240\102\113\371\153\210\010\215\264\062
\030\363\165\237\304\177\000\117\005\225\234\243\027\002\303\263
\123\233\252\040\071\051\053\146\372\235\257\136\263\222\322\265
\246\341\032\371\055\101\151\201\024\264\264\265\355\211\075\316
\373\251\235\065\102\104\261\034\024\163\201\317\052\001\065\232
\061\325\055\217\155\204\337\200\115\127\343\077\305\204\165\332
\211\306\060\273\353\217\313\042\010\240\256\252\361\003\154\072
\113\115\011\245\016\162\306\126\153\041\102\116\043\045\024\150
\256\166\012\174\014\007\160\144\371\232\057\366\005\071\046\306
\014\217\031\177\103\136\156\364\133\025\057\333\141\135\346\147
\057\077\010\224\371\140\264\230\061\332\164\361\204\223\161\115
\137\373\140\130\321\373\304\301\155\211\242\273\040\037\235\161
\221\313\062\233\023\075\076\175\222\122\065\254\222\224\242\323
\030\302\174\307\352\257\166\005\026\335\147\047\302\176\034\007
\042\041\363\100\012\033\064\007\104\023\302\204\152\216\337\031
\132\277\177\353\035\342\032\070\321\134\257\107\222\153\200\265

```
\060\245\311\215\330\253\061\201\037\337\302\146\067\323\223\251
\205\206\171\145\322
END
```

```
#
```

```
Trust for Certificate "SwissSign Platinum CA - G2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SwissSign Platinum CA - G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\126\340\372\300\073\217\030\043\125\030\345\323\021\312\350\302
\103\061\253\146
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\311\230\047\167\050\036\075\016\025\074\204\000\270\205\003\346
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\111\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\043\060\041\006\003\125\004\003\023
\032\123\167\151\163\163\123\151\147\156\040\120\154\141\164\151
\156\165\155\040\103\101\040\055\040\107\062
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\010\116\262\000\147\014\003\135\117
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "SwissSign Gold CA - G2"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SwissSign Gold CA - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\037\060\035\006\003\125\004\003\023
\026\123\167\151\163\163\123\151\147\156\040\107\157\154\144\040
```

\103\101\040\055\040\107\062
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\105\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\037\060\035\006\003\125\004\003\023
\026\123\167\151\163\163\123\151\147\156\040\107\157\154\144\040
\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\011\000\273\100\034\103\365\136\117\260
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\272\060\202\003\242\240\003\002\001\002\002\011\000
\273\100\034\103\365\136\117\260\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\060\105\061\013\060\011\006\003\125
\004\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023
\014\123\167\151\163\163\123\151\147\156\040\101\107\061\037\060
\035\006\003\125\004\003\023\026\123\167\151\163\163\123\151\147
\156\040\107\157\154\144\040\103\101\040\055\040\107\062\060\036
\027\015\060\066\061\060\062\065\060\070\063\060\063\065\132\027
\015\063\066\061\060\062\065\060\070\063\060\063\065\132\060\105
\061\013\060\011\006\003\125\004\006\023\002\103\110\061\025\060
\023\006\003\125\004\012\023\014\123\167\151\163\163\123\151\147
\156\040\101\107\061\037\060\035\006\003\125\004\003\023\026\123
\167\151\163\163\123\151\147\156\040\107\157\154\144\040\103\101
\040\055\040\107\062\060\202\002\042\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\202\002\017\000\060\202\002
\012\002\202\002\001\000\257\344\356\176\213\044\016\022\156\251
\120\055\026\104\073\222\222\134\312\270\135\204\222\102\023\052
\274\145\127\202\100\076\127\044\315\120\213\045\052\267\157\374
\357\242\320\300\037\002\044\112\023\226\217\043\023\346\050\130
\000\243\107\307\006\247\204\043\053\273\275\226\053\177\125\314
\213\301\127\037\016\142\145\017\335\075\126\212\163\332\256\176
\155\272\201\034\176\102\214\040\065\331\103\115\204\372\204\333
\122\054\363\016\047\167\013\153\277\021\057\162\170\237\056\330
\076\346\030\067\132\052\162\371\332\142\220\222\225\312\037\234
\351\263\074\053\313\363\001\023\277\132\317\301\265\012\140\275
\335\265\231\144\123\270\240\226\263\157\342\046\167\221\214\340
\142\020\002\237\064\017\244\325\222\063\121\336\276\215\272\204
\172\140\074\152\333\237\053\354\336\336\001\077\156\115\345\120
\206\313\264\257\355\104\100\305\312\132\214\332\322\053\174\250
\356\276\246\345\012\252\016\245\337\005\122\267\125\307\042\135
\062\152\227\227\143\023\333\311\333\171\066\173\205\072\112\305
\122\211\371\044\347\235\167\251\202\377\125\034\245\161\151\053
\321\002\044\362\263\046\324\153\332\004\125\345\301\012\307\155

\060\067\220\052\344\236\024\063\136\026\027\125\305\133\265\313
\064\211\222\361\235\046\217\241\007\324\306\262\170\120\333\014
\014\013\174\013\214\101\327\271\351\335\214\210\367\243\115\262
\062\314\330\027\332\315\267\316\146\235\324\375\136\377\275\227
\076\051\165\347\176\247\142\130\257\045\064\245\101\307\075\274
\015\120\312\003\003\017\010\132\037\225\163\170\142\277\257\162
\024\151\016\245\345\003\016\170\216\046\050\102\360\007\013\142
\040\020\147\071\106\372\251\003\314\004\070\172\146\357\040\203
\265\214\112\126\216\221\000\374\216\134\202\336\210\240\303\342
\150\156\175\215\357\074\335\145\364\135\254\121\357\044\200\256
\252\126\227\157\371\255\175\332\141\077\230\167\074\245\221\266
\034\214\046\332\145\242\011\155\301\342\124\343\271\312\114\114
\200\217\167\173\140\232\036\337\266\362\110\036\016\272\116\124
\155\230\340\341\242\032\242\167\120\317\304\143\222\354\107\031
\235\353\346\153\316\301\002\003\001\000\001\243\201\254\060\201
\251\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001
\006\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001
\001\377\060\035\006\003\125\035\016\004\026\004\024\133\045\173
\226\244\145\121\176\270\071\363\300\170\146\136\350\072\347\360
\356\060\037\006\003\125\035\043\004\030\060\026\200\024\133\045
\173\226\244\145\121\176\270\071\363\300\170\146\136\350\072\347
\360\356\060\106\006\003\125\035\040\004\077\060\075\060\073\006
\011\140\205\164\001\131\001\002\001\001\060\056\060\054\006\010
\053\006\001\005\005\007\002\001\026\040\150\164\164\160\072\057
\057\162\145\160\157\163\151\164\157\162\171\056\163\167\151\163
\163\163\151\147\156\056\143\157\155\057\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\002\001\000\047\272
\343\224\174\361\256\300\336\027\346\345\330\325\365\124\260\203
\364\273\315\136\005\173\117\237\165\146\257\074\350\126\176\374
\162\170\070\003\331\053\142\033\000\271\370\351\140\315\314\316
\121\212\307\120\061\156\341\112\176\030\057\151\131\266\075\144
\201\053\343\203\204\346\042\207\216\175\340\356\002\231\141\270
\036\364\270\053\210\022\026\204\302\061\223\070\226\061\246\271
\073\123\077\303\044\223\126\133\151\222\354\305\301\273\070\000
\343\354\027\251\270\334\307\174\001\203\237\062\107\272\122\042
\064\035\062\172\011\126\247\174\045\066\251\075\113\332\300\202
\157\012\273\022\310\207\113\047\021\371\036\055\307\223\077\236
\333\137\046\153\122\331\056\212\361\024\306\104\215\025\251\267
\277\275\336\246\032\356\256\055\373\110\167\027\376\273\354\257
\030\365\052\121\360\071\204\227\225\154\156\033\303\053\304\164
\140\171\045\260\012\047\337\337\136\322\071\317\105\175\102\113
\337\263\054\036\305\306\135\312\125\072\240\234\151\232\217\332
\357\262\260\074\237\207\154\022\053\145\160\025\122\061\032\044
\317\157\061\043\120\037\214\117\217\043\303\164\101\143\034\125
\250\024\335\076\340\121\120\317\361\033\060\126\016\222\260\202
\205\330\203\313\042\144\274\055\270\045\325\124\242\270\006\352
\255\222\244\044\240\301\206\265\112\023\152\107\317\056\013\126
\225\124\313\316\232\333\152\264\246\262\333\101\010\206\047\167

```
\367\152\240\102\154\013\070\316\327\165\120\062\222\302\337\053
\060\042\110\320\325\101\070\045\135\244\351\135\237\306\224\165
\320\105\375\060\227\103\217\220\253\012\307\206\163\140\112\151
\055\336\245\170\327\006\332\152\236\113\076\167\072\040\023\042
\001\320\277\150\236\143\140\153\065\115\013\155\272\241\075\300
\223\340\177\043\263\125\255\162\045\116\106\371\322\026\357\260
\144\301\001\236\351\312\240\152\230\016\317\330\140\362\057\111
\270\344\102\341\070\065\026\364\310\156\117\367\201\126\350\272
\243\276\043\257\256\375\157\003\340\002\073\060\166\372\033\155
\101\317\001\261\351\270\311\146\364\333\046\363\072\244\164\362
\111\044\133\311\260\320\127\301\372\076\172\341\227\311
END
```

```
#
```

```
Trust for Certificate "SwissSign Gold CA - G2"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "SwissSign Gold CA - G2"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\330\305\070\212\267\060\033\033\156\324\172\346\105\045\072\157
\237\032\047\141
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

```
\044\167\331\250\221\321\073\372\210\055\302\377\370\315\063\223
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\105\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\037\060\035\006\003\125\004\003\023
\026\123\167\151\163\163\123\151\147\156\040\107\157\154\144\040
\103\101\040\055\040\107\062
```

```
END
```

```
CKA_SERIAL_NUMBER
```

```
MULTILINE_OCTAL
```

```
\002\011\000\273\100\034\103\365\136\117\260
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "SwissSign Silver CA - G2"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SwissSign Silver CA - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\041\060\037\006\003\125\004\003\023
\030\123\167\151\163\163\123\151\147\156\040\123\151\154\166\145
\162\040\103\101\040\055\040\107\062
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\041\060\037\006\003\125\004\003\023
\030\123\167\151\163\163\123\151\147\156\040\123\151\154\166\145
\162\040\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\117\033\324\057\124\273\057\113
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\275\060\202\003\245\240\003\002\001\002\002\010\117
\033\324\057\124\273\057\113\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\060\107\061\013\060\011\006\003\125\004
\006\023\002\103\110\061\025\060\023\006\003\125\004\012\023\014
\123\167\151\163\163\123\151\147\156\040\101\107\061\041\060\037
\006\003\125\004\003\023\030\123\167\151\163\163\123\151\147\156
\040\123\151\154\166\145\162\040\103\101\040\055\040\107\062\060
\036\027\015\060\066\061\060\062\065\060\070\063\062\064\066\132
\027\015\063\066\061\060\062\065\060\070\063\062\064\066\132\060
\107\061\013\060\011\006\003\125\004\006\023\002\103\110\061\025
\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123\151
\147\156\040\101\107\061\041\060\037\006\003\125\004\003\023\030
\123\167\151\163\163\123\151\147\156\040\123\151\154\166\145\162
\040\103\101\040\055\040\107\062\060\202\002\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000
\060\202\002\012\002\202\002\001\000\304\361\207\177\323\170\061
\367\070\311\370\303\231\103\274\307\367\274\067\347\116\161\272
\113\217\245\163\035\134\156\230\256\003\127\256\070\067\103\057
\027\075\037\310\316\150\020\301\170\256\031\003\053\020\372\054
\171\203\366\350\271\150\271\125\362\004\104\247\071\371\374\004
\213\036\361\242\115\047\371\141\173\272\267\345\242\023\266\353
\141\076\320\154\321\346\373\372\136\355\035\264\236\240\065\133
\241\222\313\360\111\222\376\205\012\005\076\346\331\013\342\117
\273\334\225\067\374\221\351\062\065\042\321\037\072\116\047\205
```


\235\260\025\224\062\332\141\015\107\115\140\102\256\222\107\350
\203\132\120\130\351\212\213\271\135\241\334\335\231\112\037\066
\147\273\110\344\203\266\067\353\110\072\257\017\147\217\027\007
\350\004\312\357\152\061\207\324\300\266\371\224\161\173\147\144
\270\266\221\112\102\173\145\056\060\152\014\365\220\356\225\346
\362\315\202\354\331\241\112\354\366\262\113\345\105\205\346\155
\170\223\004\056\234\202\155\066\251\304\061\144\037\206\203\013
\052\364\065\012\170\311\125\317\101\260\107\351\060\237\231\276
\141\250\006\204\271\050\172\137\070\331\033\251\070\260\203\177
\163\301\303\073\110\052\202\017\041\233\270\314\250\065\303\204
\033\203\263\076\276\244\225\151\001\072\211\000\170\004\331\311
\364\231\031\253\126\176\133\213\206\071\025\221\244\020\054\011
\062\200\140\263\223\300\052\266\030\013\235\176\215\111\362\020
\112\177\371\325\106\057\031\222\243\231\247\046\254\273\214\074
\346\016\274\107\007\334\163\121\361\160\144\057\010\371\264\107
\035\060\154\104\352\051\067\205\222\150\146\274\203\070\376\173
\071\056\323\120\360\037\373\136\140\266\251\246\372\047\101\361
\233\030\162\362\365\204\164\112\311\147\304\124\256\110\144\337
\214\321\156\260\035\341\007\217\010\036\231\234\161\351\114\330
\245\367\107\022\037\164\321\121\236\206\363\302\242\043\100\013
\163\333\113\246\347\163\006\214\301\240\351\301\131\254\106\372
\346\057\370\317\161\234\106\155\271\304\025\215\070\171\003\105
\110\357\304\135\327\010\356\207\071\042\206\262\015\017\130\103
\367\161\251\110\056\375\352\326\037\002\003\001\000\001\243\201
\254\060\201\251\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\006\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024
\027\240\315\301\344\101\266\072\133\073\313\105\235\275\034\302
\230\372\206\130\060\037\006\003\125\035\043\004\030\060\026\200
\024\027\240\315\301\344\101\266\072\133\073\313\105\235\275\034
\302\230\372\206\130\060\106\006\003\125\035\040\004\077\060\075
\060\073\006\011\140\205\164\001\131\001\003\001\001\060\056\060
\054\006\010\053\006\001\005\005\007\002\001\026\040\150\164\164
\160\072\057\057\162\145\160\157\163\151\164\157\162\171\056\163
\167\151\163\163\163\151\147\156\056\143\157\155\057\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\002\001
\000\163\306\201\340\047\322\055\017\340\225\060\342\232\101\177
\120\054\137\137\142\141\251\206\152\151\030\014\164\111\326\135
\204\352\101\122\030\157\130\255\120\126\040\152\306\275\050\151
\130\221\334\221\021\065\251\072\035\274\032\245\140\236\330\037
\177\105\221\151\331\176\273\170\162\301\006\017\052\316\217\205
\160\141\254\240\315\013\270\071\051\126\204\062\116\206\273\075
\304\052\331\327\037\162\356\376\121\241\042\101\261\161\002\143
\032\202\260\142\253\136\127\022\037\337\313\335\165\240\300\135
\171\220\214\033\340\120\346\336\061\376\230\173\160\137\245\220
\330\255\370\002\266\157\323\140\335\100\113\042\305\075\255\072
\172\237\032\032\107\221\171\063\272\202\334\062\151\003\226\156
\037\113\360\161\376\343\147\162\240\261\277\134\213\344\372\231

```
\042\307\204\271\033\215\043\227\077\355\045\340\317\145\273\365
\141\004\357\335\036\262\132\101\042\132\241\237\135\054\350\133
\311\155\251\014\014\170\252\140\306\126\217\001\132\014\150\274
\151\031\171\304\037\176\227\005\277\305\351\044\121\136\324\325
\113\123\355\331\043\132\066\003\145\243\301\003\255\101\060\363
\106\033\205\220\257\145\265\325\261\344\026\133\170\165\035\227
\172\155\131\251\052\217\173\336\303\207\211\020\231\111\163\170
\310\075\275\121\065\164\052\325\361\176\151\033\052\273\073\275
\045\270\232\132\075\162\141\220\146\207\356\014\326\115\324\021
\164\013\152\376\013\003\374\243\125\127\211\376\112\313\256\133
\027\005\310\362\215\043\061\123\070\322\055\152\077\202\271\215
\010\152\367\136\101\164\156\303\021\176\007\254\051\140\221\077
\070\312\127\020\015\275\060\057\307\245\346\101\240\332\256\005
\207\232\240\244\145\154\114\011\014\211\272\270\323\271\300\223
\212\060\372\215\345\232\153\025\001\116\147\252\332\142\126\076
\204\010\146\322\304\066\175\247\076\020\374\210\340\324\200\345
\000\275\252\363\116\006\243\172\152\371\142\162\343\011\117\353
\233\016\001\043\361\237\273\174\334\334\154\021\227\045\262\362
\264\143\024\322\006\052\147\214\203\365\316\352\007\330\232\152
\036\354\344\012\273\052\114\353\011\140\071\316\312\142\330\056
\156
END
```

#

```
Trust for Certificate "SwissSign Silver CA - G2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SwissSign Silver CA - G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\233\252\345\237\126\356\041\313\103\132\276\045\223\337\247\360
\100\321\035\313
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\340\006\241\311\175\317\311\374\015\300\126\165\226\330\142\023
END
CKA_ISSUER
MULTILINE_OCTAL
\060\107\061\013\060\011\006\003\125\004\006\023\002\103\110\061
\025\060\023\006\003\125\004\012\023\014\123\167\151\163\163\123
\151\147\156\040\101\107\061\041\060\037\006\003\125\004\003\023
\030\123\167\151\163\163\123\151\147\156\040\123\151\154\166\145
\162\040\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\010\117\033\324\057\124\273\057\113
END
```

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "GeoTrust Primary Certification Authority"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Primary Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT

MULTILINE_OCTAL

\060\130\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\061\060\057\006\003\125\004\003
\023\050\107\145\157\124\162\165\163\164\040\120\162\151\155\141
\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\130\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\061\060\057\006\003\125\004\003
\023\050\107\145\157\124\162\165\163\164\040\120\162\151\155\141
\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\030\254\265\152\375\151\266\025\072\143\154\257\332\372
\304\241

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\174\060\202\002\144\240\003\002\001\002\002\020\030
\254\265\152\375\151\266\025\072\143\154\257\332\372\304\241\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\130
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\026\060
\024\006\003\125\004\012\023\015\107\145\157\124\162\165\163\164
\040\111\156\143\056\061\061\060\057\006\003\125\004\003\023\050
\107\145\157\124\162\165\163\164\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\060\036\027\015\060\066\061\061
\062\067\060\060\060\060\060\060\132\027\015\063\066\060\067\061
\066\062\063\065\071\065\071\132\060\130\061\013\060\011\006\003

\125\004\006\023\002\125\123\061\026\060\024\006\003\125\004\012
\023\015\107\145\157\124\162\165\163\164\040\111\156\143\056\061
\061\060\057\006\003\125\004\003\023\050\107\145\157\124\162\165
\163\164\040\120\162\151\155\141\162\171\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\060\202\001\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202
\001\001\000\276\270\025\173\377\324\174\175\147\255\203\144\173
\310\102\123\055\337\366\204\010\040\141\326\001\131\152\234\104
\021\257\357\166\375\225\176\316\141\060\273\172\203\137\002\275
\001\146\312\356\025\215\157\241\060\234\275\241\205\236\224\072
\363\126\210\000\061\317\330\356\152\226\002\331\355\003\214\373
\165\155\347\352\270\125\026\005\026\232\364\340\136\261\210\300
\144\205\134\025\115\210\307\267\272\340\165\351\255\005\075\235
\307\211\110\340\273\050\310\003\341\060\223\144\136\122\300\131
\160\042\065\127\210\212\361\225\012\203\327\274\061\163\001\064
\355\357\106\161\340\153\002\250\065\162\153\227\233\146\340\313
\034\171\137\330\032\004\150\036\107\002\346\235\140\342\066\227
\001\337\316\065\222\337\276\147\307\155\167\131\073\217\235\326
\220\025\224\274\102\064\020\301\071\371\261\047\076\176\326\212
\165\305\262\257\226\323\242\336\233\344\230\276\175\341\351\201
\255\266\157\374\327\016\332\340\064\260\015\032\167\347\343\010
\230\357\130\372\234\204\267\066\257\302\337\254\322\364\020\006
\160\161\065\002\003\001\000\001\243\102\060\100\060\017\006\003
\125\035\023\001\001\377\004\005\060\003\001\001\377\060\016\006
\003\125\035\017\001\001\377\004\004\003\002\001\006\060\035\006
\003\125\035\016\004\026\004\024\054\325\120\101\227\025\213\360
\217\066\141\133\112\373\153\331\231\311\063\222\060\015\006\011
\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000
\132\160\177\054\335\267\064\117\365\206\121\251\046\276\113\270
\252\361\161\015\334\141\307\240\352\064\036\172\167\017\004\065
\350\047\217\154\220\277\221\026\044\106\076\112\116\316\053\026
\325\013\122\035\374\037\147\242\002\105\061\117\316\363\372\003
\247\171\235\123\152\331\332\143\072\370\200\327\323\231\341\245
\341\276\324\125\161\230\065\072\276\223\352\256\255\102\262\220
\157\340\374\041\115\065\143\063\211\111\326\233\116\312\307\347
\116\011\000\367\332\307\357\231\142\231\167\266\225\042\136\212
\240\253\364\270\170\230\312\070\031\231\311\162\236\170\315\113
\254\257\031\240\163\022\055\374\302\101\272\201\221\332\026\132
\061\267\371\264\161\200\022\110\231\162\163\132\131\123\301\143
\122\063\355\247\311\322\071\002\160\372\340\261\102\146\051\252
\233\121\355\060\124\042\024\137\331\253\035\301\344\224\360\370
\365\053\367\352\312\170\106\326\270\221\375\246\015\053\032\024
\001\076\200\360\102\240\225\007\136\155\315\314\113\244\105\215
\253\022\350\263\336\132\345\240\174\350\017\042\035\132\351\131
END

#

```

Trust for Certificate "GeoTrust Primary Certification Authority"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Primary Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\062\074\021\216\033\367\270\266\122\124\342\342\020\015\326\002
\220\067\360\226
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\002\046\303\001\136\010\060\067\103\251\320\175\317\067\346\277
END
CKA_ISSUER
MULTILINE_OCTAL
\060\130\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165
\163\164\040\111\156\143\056\061\061\060\057\006\003\125\004\003
\023\050\107\145\157\124\162\165\163\164\040\120\162\151\155\141
\162\171\040\103\145\162\164\151\146\151\143\141\164\151\157\156
\040\101\165\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\030\254\265\152\375\151\266\025\072\143\154\257\332\372
\304\241
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "thawte Primary Root CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "thawte
Primary Root CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\251\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\070\060\066\006\003\125\004\013\023\057\050\143\051\040

```

\062\060\060\066\040\164\150\141\167\164\145\054\040\111\156\143
\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172
\145\144\040\165\163\145\040\157\156\154\171\061\037\060\035\006
\003\125\004\003\023\026\164\150\141\167\164\145\040\120\162\151
\155\141\162\171\040\122\157\157\164\040\103\101

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\251\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\070\060\066\006\003\125\004\013\023\057\050\143\051\040
\062\060\060\066\040\164\150\141\167\164\145\054\040\111\156\143
\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172
\145\144\040\165\163\145\040\157\156\154\171\061\037\060\035\006
\003\125\004\003\023\026\164\150\141\167\164\145\040\120\162\151
\155\141\162\171\040\122\157\157\164\040\103\101

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\064\116\325\127\040\325\355\354\111\364\057\316\067\333
\053\155

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\040\060\202\003\010\240\003\002\001\002\002\020\064
\116\325\127\040\325\355\354\111\364\057\316\067\333\053\155\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\251\061\013\060\011\006\003\125\004\006\023\002\125\123\061\025
\060\023\006\003\125\004\012\023\014\164\150\141\167\164\145\054
\040\111\156\143\056\061\050\060\046\006\003\125\004\013\023\037
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123\145
\162\166\151\143\145\163\040\104\151\166\151\163\151\157\156\061
\070\060\066\006\003\125\004\013\023\057\050\143\051\040\062\060
\060\066\040\164\150\141\167\164\145\054\040\111\156\143\056\040
\055\040\106\157\162\040\141\165\164\150\157\162\151\172\145\144
\040\165\163\145\040\157\156\154\171\061\037\060\035\006\003\125
\004\003\023\026\164\150\141\167\164\145\040\120\162\151\155\141
\162\171\040\122\157\157\164\040\103\101\060\036\027\015\060\066
\061\061\061\067\060\060\060\060\060\060\132\027\015\063\066\060
\067\061\066\062\063\065\071\065\071\132\060\201\251\061\013\060
\011\006\003\125\004\006\023\002\125\123\061\025\060\023\006\003
\125\004\012\023\014\164\150\141\167\164\145\054\040\111\156\143
\056\061\050\060\046\006\003\125\004\013\023\037\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\123\145\162\166\151\143
\145\163\040\104\151\166\151\163\151\157\156\061\070\060\066\006
\003\125\004\013\023\057\050\143\051\040\062\060\060\066\040\164

\150\141\167\164\145\054\040\111\156\143\056\040\055\040\106\157
\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163\145
\040\157\156\154\171\061\037\060\035\006\003\125\004\003\023\026
\164\150\141\167\164\145\040\120\162\151\155\141\162\171\040\122
\157\157\164\040\103\101\060\202\001\042\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202
\001\012\002\202\001\001\000\254\240\360\373\200\131\324\234\307
\244\317\235\241\131\163\011\020\105\014\015\054\156\150\361\154
\133\110\150\111\131\067\374\013\063\031\302\167\177\314\020\055
\225\064\034\346\353\115\011\247\034\322\270\311\227\066\002\267
\211\324\044\137\006\300\314\104\224\224\215\002\142\157\353\132
\335\021\215\050\232\134\204\220\020\172\015\275\164\146\057\152
\070\240\342\325\124\104\353\035\007\237\007\272\157\356\351\375
\116\013\051\365\076\204\240\001\361\234\253\370\034\176\211\244
\350\241\330\161\145\015\243\121\173\356\274\322\042\140\015\271
\133\235\337\272\374\121\133\013\257\230\262\351\056\351\004\350
\142\207\336\053\310\327\116\301\114\144\036\335\317\207\130\272
\112\117\312\150\007\035\034\235\112\306\325\057\221\314\174\161
\162\034\305\300\147\353\062\375\311\222\134\224\332\205\300\233
\277\123\175\053\011\364\214\235\221\037\227\152\122\313\336\011
\066\244\167\330\173\207\120\104\325\076\156\051\151\373\071\111
\046\036\011\245\200\173\100\055\353\350\047\205\311\376\141\375
\176\346\174\227\035\325\235\002\003\001\000\001\243\102\060\100
\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001
\377\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001
\006\060\035\006\003\125\035\016\004\026\004\024\173\133\105\317
\257\316\313\172\375\061\222\032\152\266\363\106\353\127\110\120
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\171\021\300\113\263\221\266\374\360\351\147\324
\015\156\105\276\125\350\223\322\316\003\077\355\332\045\260\035
\127\313\036\072\166\240\114\354\120\166\350\144\162\014\244\251
\361\270\213\326\326\207\204\273\062\345\101\021\300\167\331\263
\140\235\353\033\325\321\156\104\104\251\246\001\354\125\142\035
\167\270\134\216\110\111\174\234\073\127\021\254\255\163\067\216
\057\170\134\220\150\107\331\140\140\346\374\007\075\042\040\027
\304\367\026\351\304\330\162\371\310\163\174\337\026\057\025\251
\076\375\152\047\266\241\353\132\272\230\037\325\343\115\144\012
\235\023\310\141\272\365\071\034\207\272\270\275\173\042\177\366
\376\254\100\171\345\254\020\157\075\217\033\171\166\213\304\067
\263\041\030\204\345\066\000\353\143\040\231\271\351\376\063\004
\273\101\310\301\002\371\104\143\040\236\201\316\102\323\326\077
\054\166\323\143\234\131\335\217\246\341\016\240\056\101\367\056
\225\107\317\274\375\063\363\366\013\141\176\176\221\053\201\107
\302\047\060\356\247\020\135\067\217\134\071\053\344\004\360\173
\215\126\214\150

END

#

```

Trust for Certificate "thawte Primary Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "thawte Primary Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\221\306\326\356\076\212\310\143\204\345\110\302\231\051\134\165
\154\201\173\201
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\214\312\334\013\042\316\365\276\162\254\101\032\021\250\330\022
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\251\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\070\060\066\006\003\125\004\013\023\057\050\143\051\040
\062\060\060\066\040\164\150\141\167\164\145\054\040\111\156\143
\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172
\145\144\040\165\163\145\040\157\156\154\171\061\037\060\035\006
\003\125\004\003\023\026\164\150\141\167\164\145\040\120\162\151
\155\141\162\171\040\122\157\157\164\040\103\101
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\064\116\325\127\040\325\355\354\111\364\057\316\067\333
\053\155
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "VeriSign Class 3 Public Primary Certification Authority - G5"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "VeriSign Class 3 Public Primary Certification Authority - G5"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123

```


\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\066\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\065

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\066\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\065

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\030\332\321\236\046\175\350\273\112\041\130\315\314\153
\073\112

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\323\060\202\003\273\240\003\002\001\002\002\020\030
\332\321\236\046\175\350\273\112\041\130\315\314\153\073\112\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\312\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027
\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151\147
\156\054\040\111\156\143\056\061\037\060\035\006\003\125\004\013
\023\026\126\145\162\151\123\151\147\156\040\124\162\165\163\164
\040\116\145\164\167\157\162\153\061\072\060\070\006\003\125\004
\013\023\061\050\143\051\040\062\060\060\066\040\126\145\162\151
\123\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162
\040\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040
\157\156\154\171\061\105\060\103\006\003\125\004\003\023\074\126
\145\162\151\123\151\147\156\040\103\154\141\163\163\040\063\040

\120\165\142\154\151\143\040\120\162\151\155\141\162\171\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\040\055\040\107\065\060\036\027\015\060
\066\061\061\060\070\060\060\060\060\060\060\132\027\015\063\066
\060\067\061\066\062\063\065\071\065\071\132\060\201\312\061\013
\060\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006
\003\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040
\111\156\143\056\061\037\060\035\006\003\125\004\013\023\026\126
\145\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145
\164\167\157\162\153\061\072\060\070\006\003\125\004\013\023\061
\050\143\051\040\062\060\060\066\040\126\145\162\151\123\151\147
\156\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165
\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154
\171\061\105\060\103\006\003\125\004\003\023\074\126\145\162\151
\123\151\147\156\040\103\154\141\163\163\040\063\040\120\165\142
\154\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\055\040\107\065\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\257\044\010\010\051\172\065
\236\140\014\252\347\113\073\116\334\174\274\074\105\034\273\053
\340\376\051\002\371\127\010\243\144\205\025\047\365\361\255\310
\061\211\135\042\350\052\252\246\102\263\217\370\271\125\267\261
\267\113\263\376\217\176\007\127\354\357\103\333\146\142\025\141
\317\140\015\244\330\336\370\340\303\142\010\075\124\023\353\111
\312\131\124\205\046\345\053\217\033\237\353\365\241\221\302\063
\111\330\103\143\152\122\113\322\217\350\160\121\115\321\211\151
\173\307\160\366\263\334\022\164\333\173\135\113\126\323\226\277
\025\167\241\260\364\242\045\362\257\034\222\147\030\345\364\006
\004\357\220\271\344\000\344\335\072\265\031\377\002\272\364\074
\356\340\213\353\067\213\354\364\327\254\362\366\360\075\257\335
\165\221\063\031\035\034\100\313\164\044\031\041\223\331\024\376
\254\052\122\307\217\325\004\111\344\215\143\107\210\074\151\203
\313\376\107\275\053\176\117\305\225\256\016\235\324\321\103\300
\147\163\343\024\010\176\345\077\237\163\270\063\012\317\135\077
\064\207\226\212\356\123\350\045\025\002\003\001\000\001\243\201
\262\060\201\257\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377\004
\004\003\002\001\006\060\155\006\010\053\006\001\005\005\007\001
\014\004\141\060\137\241\135\240\133\060\131\060\127\060\125\026
\011\151\155\141\147\145\057\147\151\146\060\041\060\037\060\007
\006\005\053\016\003\002\032\004\024\217\345\323\032\206\254\215
\216\153\303\317\200\152\324\110\030\054\173\031\056\060\045\026
\043\150\164\164\160\072\057\057\154\157\147\157\056\166\145\162
\151\163\151\147\156\056\143\157\155\057\166\163\154\157\147\157
\056\147\151\146\060\035\006\003\125\035\016\004\026\004\024\177
\323\145\247\302\335\354\273\360\060\011\363\103\071\372\002\257
\063\061\063\060\015\006\011\052\206\110\206\367\015\001\001\005

```
\005\000\003\202\001\001\000\223\044\112\060\137\142\317\330\032
\230\057\075\352\334\231\055\275\167\366\245\171\042\070\354\304
\247\240\170\022\255\142\016\105\160\144\305\347\227\146\055\230
\011\176\137\257\326\314\050\145\362\001\252\010\032\107\336\371
\371\174\222\132\010\151\040\015\331\076\155\156\074\015\156\330
\346\006\221\100\030\271\370\301\355\337\333\101\252\340\226\040
\311\315\144\025\070\201\311\224\356\242\204\051\013\023\157\216
\333\014\335\045\002\333\244\213\031\104\322\101\172\005\151\112
\130\117\140\312\176\202\152\013\002\252\045\027\071\265\333\177
\347\204\145\052\225\212\275\206\336\136\201\026\203\055\020\314
\336\375\250\202\052\155\050\037\015\013\304\345\347\032\046\031
\341\364\021\157\020\265\225\374\347\102\005\062\333\316\235\121
\136\050\266\236\205\323\133\357\245\175\105\100\162\216\267\016
\153\016\006\373\063\065\110\161\270\235\047\213\304\145\137\015
\206\166\234\104\172\366\225\134\366\135\062\010\063\244\124\266
\030\077\150\134\362\102\112\205\070\124\203\137\321\350\054\362
\254\021\326\250\355\143\152
```

END

#

Trust for Certificate "VeriSign Class 3 Public Primary Certification Authority - G5"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL

UTF8 "VeriSign Class 3 Public Primary Certification Authority - G5"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\116\266\325\170\111\233\034\317\137\130\036\255\126\276\075\233
\147\104\245\345
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\313\027\344\061\147\076\342\011\376\105\127\223\363\012\372\034
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\066\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\065
```

```

END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\030\332\321\236\046\175\350\273\112\041\130\315\314\153
\073\112
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "SecureTrust CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SecureTrust CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\027\060\025\006\003\125\004\003\023\016\123\145\143\165
\162\145\124\162\165\163\164\040\103\101
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\027\060\025\006\003\125\004\003\023\016\123\145\143\165
\162\145\124\162\165\163\164\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\014\360\216\134\010\026\245\255\102\177\360\353\047\030
\131\320
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\270\060\202\002\240\240\003\002\001\002\002\020\014
\360\216\134\010\026\245\255\102\177\360\353\047\030\131\320\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\110
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\040\060
\036\006\003\125\004\012\023\027\123\145\143\165\162\145\124\162
\165\163\164\040\103\157\162\160\157\162\141\164\151\157\156\061
\027\060\025\006\003\125\004\003\023\016\123\145\143\165\162\145

```

\124\162\165\163\164\040\103\101\060\036\027\015\060\066\061\061
\060\067\061\071\063\061\061\070\132\027\015\062\071\061\062\063
\061\061\071\064\060\065\065\132\060\110\061\013\060\011\006\003
\125\004\006\023\002\125\123\061\040\060\036\006\003\125\004\012
\023\027\123\145\143\165\162\145\124\162\165\163\164\040\103\157
\162\160\157\162\141\164\151\157\156\061\027\060\025\006\003\125
\004\003\023\016\123\145\143\165\162\145\124\162\165\163\164\040
\103\101\060\202\001\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202
\001\001\000\253\244\201\345\225\315\365\366\024\216\302\117\312
\324\342\170\225\130\234\101\341\015\231\100\044\027\071\221\063
\146\351\276\341\203\257\142\134\211\321\374\044\133\141\263\340
\021\021\101\034\035\156\360\270\273\370\336\247\201\272\246\110
\306\237\035\275\276\216\251\101\076\270\224\355\051\032\324\216
\322\003\035\003\357\155\015\147\034\127\327\006\255\312\310\365
\376\016\257\146\045\110\004\226\013\135\243\272\026\303\010\117
\321\106\370\024\134\362\310\136\001\231\155\375\210\314\206\250
\301\157\061\102\154\122\076\150\313\363\031\064\337\273\207\030
\126\200\046\304\320\334\300\157\337\336\240\302\221\026\240\144
\021\113\104\274\036\366\347\372\143\336\146\254\166\244\161\243
\354\066\224\150\172\167\244\261\347\016\057\201\172\342\265\162
\206\357\242\153\213\360\017\333\323\131\077\272\162\274\104\044
\234\343\163\263\367\257\127\057\102\046\235\251\164\272\000\122
\362\113\315\123\174\107\013\066\205\016\146\251\010\227\026\064
\127\301\146\367\200\343\355\160\124\307\223\340\056\050\025\131
\207\272\273\002\003\001\000\001\243\201\235\060\201\232\060\023
\006\011\053\006\001\004\001\202\067\024\002\004\006\036\004\000
\103\000\101\060\013\006\003\125\035\017\004\004\003\002\001\206
\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001
\377\060\035\006\003\125\035\016\004\026\004\024\102\062\266\026
\372\004\375\376\135\113\172\303\375\367\114\100\035\132\103\257
\060\064\006\003\125\035\037\004\055\060\053\060\051\240\047\240
\045\206\043\150\164\164\160\072\057\057\143\162\154\056\163\145
\143\165\162\145\164\162\165\163\164\056\143\157\155\057\123\124
\103\101\056\143\162\154\060\020\006\011\053\006\001\004\001\202
\067\025\001\004\003\002\001\000\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\202\001\001\000\060\355\117\112
\341\130\072\122\162\133\265\246\243\145\030\246\273\121\073\167
\351\235\352\323\237\134\340\105\145\173\015\312\133\342\160\120
\262\224\005\024\256\111\307\215\101\007\022\163\224\176\014\043
\041\375\274\020\177\140\020\132\162\365\230\016\254\354\271\177
\335\172\157\135\323\034\364\377\210\005\151\102\251\005\161\310
\267\254\046\350\056\264\214\152\377\161\334\270\261\337\231\274
\174\041\124\053\344\130\242\273\127\051\256\236\251\243\031\046
\017\231\056\010\260\357\375\151\317\231\032\011\215\343\247\237
\053\311\066\064\173\044\263\170\114\225\027\244\006\046\036\266
\144\122\066\137\140\147\331\234\305\005\164\013\347\147\043\322
\010\374\210\351\256\213\177\341\060\364\067\176\375\306\062\332

```
\055\236\104\060\060\154\356\007\336\322\064\374\322\377\100\366
\113\364\146\106\006\124\246\362\062\012\143\046\060\153\233\321
\334\213\107\272\341\271\325\142\320\242\240\364\147\005\170\051
\143\032\157\004\326\370\306\114\243\232\261\067\264\215\345\050
\113\035\236\054\302\270\150\274\355\002\356\061
END
```

```
#
```

```
Trust for Certificate "SecureTrust CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SecureTrust CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\207\202\306\303\004\065\073\317\322\226\222\322\131\076\175\104
\331\064\377\021
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\334\062\303\247\155\045\127\307\150\011\235\352\055\251\242\321
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\110\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\027\060\025\006\003\125\004\003\023\016\123\145\143\165
\162\145\124\162\165\163\164\040\103\101
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\014\360\216\134\010\026\245\255\102\177\360\353\047\030
\131\320
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "Secure Global CA"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Secure Global CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
```

\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\031\060\027\006\003\125\004\003\023\020\123\145\143\165
\162\145\040\107\154\157\142\141\154\040\103\101

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\031\060\027\006\003\125\004\003\023\020\123\145\143\165
\162\145\040\107\154\157\142\141\154\040\103\101

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\007\126\042\244\350\324\212\211\115\364\023\310\360\370
\352\245

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\274\060\202\002\244\240\003\002\001\002\002\020\007
\126\042\244\350\324\212\211\115\364\023\310\360\370\352\245\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\112
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\040\060
\036\006\003\125\004\012\023\027\123\145\143\165\162\145\124\162
\165\163\164\040\103\157\162\160\157\162\141\164\151\157\156\061
\031\060\027\006\003\125\004\003\023\020\123\145\143\165\162\145
\040\107\154\157\142\141\154\040\103\101\060\036\027\015\060\066
\061\061\060\067\061\071\064\062\062\070\132\027\015\062\071\061
\062\063\061\061\071\065\062\060\066\132\060\112\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\040\060\036\006\003\125
\004\012\023\027\123\145\143\165\162\145\124\162\165\163\164\040
\103\157\162\160\157\162\141\164\151\157\156\061\031\060\027\006
\003\125\004\003\023\020\123\145\143\165\162\145\040\107\154\157
\142\141\154\040\103\101\060\202\001\042\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202
\001\012\002\202\001\001\000\257\065\056\330\254\154\125\151\006
\161\345\023\150\044\263\117\330\314\041\107\370\361\140\070\211
\211\003\351\275\352\136\106\123\011\334\134\365\132\350\367\105
\052\002\353\061\141\327\051\063\114\316\307\174\012\067\176\017
\272\062\230\341\035\227\257\217\307\334\311\070\226\363\333\032
\374\121\355\150\306\320\156\244\174\044\321\256\102\310\226\120
\143\056\340\376\165\376\230\247\137\111\056\225\343\071\063\144
\216\036\244\137\220\322\147\074\262\331\376\101\271\125\247\011
\216\162\005\036\213\335\104\205\202\102\320\111\300\035\140\360
\321\027\054\225\353\366\245\301\222\243\305\302\247\010\140\015
\140\004\020\226\171\236\026\064\346\251\266\372\045\105\071\310
\036\145\371\223\365\252\361\122\334\231\230\075\245\206\032\014

```
\065\063\372\113\245\004\006\025\034\061\200\357\252\030\153\302
\173\327\332\316\371\063\040\325\365\275\152\063\055\201\004\373
\260\134\324\234\243\342\134\035\343\251\102\165\136\173\324\167
\357\071\124\272\311\012\030\033\022\231\111\057\210\113\375\120
\142\321\163\347\217\172\103\002\003\001\000\001\243\201\235\060
\201\232\060\023\006\011\053\006\001\004\001\202\067\024\002\004
\006\036\004\000\103\000\101\060\013\006\003\125\035\017\004\004
\003\002\001\206\060\017\006\003\125\035\023\001\001\377\004\005
\060\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024
\257\104\004\302\101\176\110\203\333\116\071\002\354\354\204\172
\346\316\311\244\060\064\006\003\125\035\037\004\055\060\053\060
\051\240\047\240\045\206\043\150\164\164\160\072\057\057\143\162
\154\056\163\145\143\165\162\145\164\162\165\163\164\056\143\157
\155\057\123\107\103\101\056\143\162\154\060\020\006\011\053\006
\001\004\001\202\067\025\001\004\003\002\001\000\060\015\006\011
\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000
\143\032\010\100\175\244\136\123\015\167\330\172\256\037\015\013
\121\026\003\357\030\174\310\343\257\152\130\223\024\140\221\262
\204\334\210\116\276\071\212\072\363\346\202\211\135\001\067\263
\253\044\244\025\016\222\065\132\112\104\136\116\127\372\165\316
\037\110\316\146\364\074\100\046\222\230\154\033\356\044\106\014
\027\263\122\245\333\245\221\221\317\067\323\157\347\047\010\072
\116\031\037\072\247\130\134\027\317\171\077\213\344\247\323\046
\043\235\046\017\130\151\374\107\176\262\320\215\213\223\277\051
\117\103\151\164\166\147\113\317\007\214\346\002\367\265\341\264
\103\265\113\055\024\237\371\334\046\015\277\246\107\164\006\330
\210\321\072\051\060\204\316\322\071\200\142\033\250\307\127\111
\274\152\125\121\147\025\112\276\065\007\344\325\165\230\067\171
\060\024\333\051\235\154\305\151\314\107\125\242\060\367\314\134
\177\302\303\230\034\153\116\026\200\353\172\170\145\105\242\000
\032\257\014\015\125\144\064\110\270\222\271\361\264\120\051\362
\117\043\037\332\154\254\037\104\341\335\043\170\121\133\307\026
END
```

#

```
Trust for Certificate "Secure Global CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Secure Global CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\072\104\163\132\345\201\220\037\044\206\141\106\036\073\234\304
\137\365\072\033
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\317\364\047\015\324\355\334\145\026\111\155\075\332\277\156\336
END
```



```

CKA_ISSUER
MULTILINE_OCTAL
\060\112\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\023\027\123\145\143\165\162\145
\124\162\165\163\164\040\103\157\162\160\157\162\141\164\151\157
\156\061\031\060\027\006\003\125\004\003\023\020\123\145\143\165
\162\145\040\107\154\157\142\141\154\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\007\126\042\244\350\324\212\211\115\364\023\310\360\370
\352\245
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "COMODO Certification Authority"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "COMODO Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\201\061\013\060\011\006\003\125\004\006\023\002\107\102
\061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\040\103\101\040\114\151\155\151\164\145\144\061\047\060\045\006
\003\125\004\003\023\036\103\117\115\117\104\117\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\201\061\013\060\011\006\003\125\004\006\023\002\107\102
\061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\040\103\101\040\114\151\155\151\164\145\144\061\047\060\045\006
\003\125\004\003\023\036\103\117\115\117\104\117\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157

```

\162\151\164\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\116\201\055\212\202\145\340\013\002\356\076\065\002\106
\345\075

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\035\060\202\003\005\240\003\002\001\002\002\020\116
\201\055\212\202\145\340\013\002\356\076\065\002\106\345\075\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\201\061\013\060\011\006\003\125\004\006\023\002\107\102\061\033
\060\031\006\003\125\004\010\023\022\107\162\145\141\164\145\162
\040\115\141\156\143\150\145\163\164\145\162\061\020\060\016\006
\003\125\004\007\023\007\123\141\154\146\157\162\144\061\032\060
\030\006\003\125\004\012\023\021\103\117\115\117\104\117\040\103
\101\040\114\151\155\151\164\145\144\061\047\060\045\006\003\125
\004\003\023\036\103\117\115\117\104\117\040\103\145\162\164\151
\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151
\164\171\060\036\027\015\060\066\061\062\060\061\060\060\060\060
\060\060\132\027\015\062\071\061\062\063\061\062\063\065\071\065
\071\132\060\201\201\061\013\060\011\006\003\125\004\006\023\002
\107\102\061\033\060\031\006\003\125\004\010\023\022\107\162\145
\141\164\145\162\040\115\141\156\143\150\145\163\164\145\162\061
\020\060\016\006\003\125\004\007\023\007\123\141\154\146\157\162
\144\061\032\060\030\006\003\125\004\012\023\021\103\117\115\117
\104\117\040\103\101\040\114\151\155\151\164\145\144\061\047\060
\045\006\003\125\004\003\023\036\103\117\115\117\104\117\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\060\202\001\042\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202
\001\012\002\202\001\001\000\320\100\213\213\162\343\221\033\367
\121\301\033\124\004\230\323\251\277\301\346\212\135\073\207\373
\273\210\316\015\343\057\077\006\226\360\242\051\120\231\256\333
\073\241\127\260\164\121\161\315\355\102\221\115\101\376\251\310
\330\152\206\167\104\273\131\146\227\120\136\264\324\054\160\104
\317\332\067\225\102\151\074\060\304\161\263\122\360\041\115\241
\330\272\071\174\034\236\243\044\235\362\203\026\230\252\026\174
\103\233\025\133\267\256\064\221\376\324\142\046\030\106\232\077
\353\301\371\361\220\127\353\254\172\015\213\333\162\060\152\146
\325\340\106\243\160\334\150\331\377\004\110\211\167\336\265\351
\373\147\155\101\351\274\071\275\062\331\142\002\361\261\250\075
\156\067\234\342\057\342\323\242\046\213\306\270\125\103\210\341
\043\076\245\322\044\071\152\107\253\000\324\241\263\251\045\376
\015\077\247\035\272\323\121\301\013\244\332\254\070\357\125\120
\044\005\145\106\223\064\117\055\215\255\306\324\041\031\322\216
\312\005\141\161\007\163\107\345\212\031\022\275\004\115\316\116
\234\245\110\254\273\046\367\002\003\001\000\001\243\201\216\060

```
\201\213\060\035\006\003\125\035\016\004\026\004\024\013\130\345
\213\306\114\025\067\244\100\251\060\251\041\276\107\066\132\126
\377\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001
\006\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001
\001\377\060\111\006\003\125\035\037\004\102\060\100\060\076\240
\074\240\072\206\070\150\164\164\160\072\057\057\143\162\154\056
\143\157\155\157\144\157\143\141\056\143\157\155\057\103\117\115
\117\104\117\103\145\162\164\151\146\151\143\141\164\151\157\156
\101\165\164\150\157\162\151\164\171\056\143\162\154\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001
\000\076\230\236\233\366\033\351\327\071\267\170\256\035\162\030
\111\323\207\344\103\202\353\077\311\252\365\250\265\357\125\174
\041\122\145\371\325\015\341\154\364\076\214\223\163\221\056\002
\304\116\007\161\157\300\217\070\141\010\250\036\201\012\300\057
\040\057\101\213\221\334\110\105\274\361\306\336\272\166\153\063
\310\000\055\061\106\114\355\347\235\317\210\224\377\063\300\126
\350\044\206\046\270\330\070\070\337\052\153\335\022\314\307\077
\107\027\114\242\302\006\226\011\326\333\376\077\074\106\101\337
\130\342\126\017\074\073\301\034\223\065\331\070\122\254\356\310
\354\056\060\116\224\065\264\044\037\113\170\151\332\362\002\070
\314\225\122\223\360\160\045\131\234\040\147\304\356\371\213\127
\141\364\222\166\175\077\204\215\125\267\350\345\254\325\361\365
\031\126\246\132\373\220\034\257\223\353\345\034\324\147\227\135
\004\016\276\013\203\246\027\203\271\060\022\240\305\063\025\005
\271\015\373\307\005\166\343\330\112\215\374\064\027\243\306\041
\050\276\060\105\061\036\307\170\276\130\141\070\254\073\342\001
\145
END
```

```
#
Trust for Certificate "COMODO Certification Authority"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "COMODO Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\146\061\277\236\367\117\236\266\311\325\246\014\272\152\276\321
\367\275\357\173
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\134\110\334\367\102\162\354\126\224\155\034\314\161\065\200\165
END
CKA_ISSUER
MULTILINE_OCTAL
\060\201\201\061\013\060\011\006\003\125\004\006\023\002\107\102
\061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
```

```
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\040\103\101\040\114\151\155\151\164\145\144\061\047\060\045\006
\003\125\004\003\023\036\103\117\115\117\104\117\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\020\116\201\055\212\202\145\340\013\002\356\076\065\002\106
\345\075
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "DigiNotar Root CA"

#

CKA_CLASS

CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "DigiNotar Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\137\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\022\060\020\006\003\125\004\012\023\011\104\151\147\151\116\157
\164\141\162\061\032\060\030\006\003\125\004\003\023\021\104\151
\147\151\116\157\164\141\162\040\122\157\157\164\040\103\101\061
\040\060\036\006\011\052\206\110\206\367\015\001\011\001\026\021
\151\156\146\157\100\144\151\147\151\156\157\164\141\162\056\156
\154
```

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\137\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\022\060\020\006\003\125\004\012\023\011\104\151\147\151\116\157
\164\141\162\061\032\060\030\006\003\125\004\003\023\021\104\151
\147\151\116\157\164\141\162\040\122\157\157\164\040\103\101\061
\040\060\036\006\011\052\206\110\206\367\015\001\011\001\026\021
\151\156\146\157\100\144\151\147\151\156\157\164\141\162\056\156
\154
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\020\014\166\332\234\221\014\116\054\236\376\025\320\130\223
```

\074\114

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\212\060\202\003\162\240\003\002\001\002\002\020\014
\166\332\234\221\014\116\054\236\376\025\320\130\223\074\114\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\137
\061\013\060\011\006\003\125\004\006\023\002\116\114\061\022\060
\020\006\003\125\004\012\023\011\104\151\147\151\116\157\164\141
\162\061\032\060\030\006\003\125\004\003\023\021\104\151\147\151
\116\157\164\141\162\040\122\157\157\164\040\103\101\061\040\060
\036\006\011\052\206\110\206\367\015\001\011\001\026\021\151\156
\146\157\100\144\151\147\151\156\157\164\141\162\056\156\154\060
\036\027\015\060\067\060\065\061\066\061\067\061\071\063\066\132
\027\015\062\065\060\063\063\061\061\070\061\071\062\061\132\060
\137\061\013\060\011\006\003\125\004\006\023\002\116\114\061\022
\060\020\006\003\125\004\012\023\011\104\151\147\151\116\157\164
\141\162\061\032\060\030\006\003\125\004\003\023\021\104\151\147
\151\116\157\164\141\162\040\122\157\157\164\040\103\101\061\040
\060\036\006\011\052\206\110\206\367\015\001\011\001\026\021\151
\156\146\157\100\144\151\147\151\156\157\164\141\162\056\156\154
\060\202\002\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\002\017\000\060\202\002\012\002\202\002\001
\000\254\260\130\301\000\275\330\041\010\013\053\232\376\156\126
\060\005\237\033\167\220\020\101\134\303\015\207\021\167\216\201
\361\312\174\351\214\152\355\070\164\065\273\332\337\371\273\300
\011\067\264\226\163\201\175\063\032\230\071\367\223\157\225\177
\075\271\261\165\207\272\121\110\350\213\160\076\225\004\305\330
\266\303\026\331\210\260\261\207\035\160\332\206\264\017\024\213
\172\317\020\321\164\066\242\022\173\167\206\112\171\346\173\337
\002\021\150\245\116\206\256\064\130\233\044\023\170\126\042\045
\036\001\213\113\121\161\373\202\314\131\226\151\210\132\150\123
\305\271\015\002\067\313\113\274\146\112\220\176\052\013\005\007
\355\026\137\125\220\165\330\106\311\033\203\342\010\276\361\043
\314\231\035\326\052\017\203\040\025\130\047\202\056\372\342\042
\302\111\261\271\001\201\152\235\155\235\100\167\150\166\116\041
\052\155\204\100\205\116\166\231\174\202\363\363\267\002\131\324
\046\001\033\216\337\255\123\006\321\256\030\335\342\262\072\313
\327\210\070\216\254\133\051\271\031\323\230\371\030\003\317\110
\202\206\146\013\033\151\017\311\353\070\210\172\046\032\005\114
\222\327\044\324\226\362\254\122\055\243\107\325\122\366\077\376
\316\204\006\160\246\252\076\242\362\266\126\064\030\127\242\344
\201\155\347\312\360\152\323\307\221\153\002\203\101\174\025\357
\153\232\144\136\343\320\074\345\261\353\173\135\206\373\313\346
\167\111\315\243\145\334\367\271\234\270\344\013\137\223\317\314
\060\032\062\034\316\034\143\225\245\371\352\341\164\213\236\351
\053\251\060\173\240\030\037\016\030\013\345\133\251\323\321\154
\036\007\147\217\221\113\251\212\274\322\146\252\223\001\210\262
\221\372\061\134\325\246\301\122\010\011\315\012\143\242\323\042

\246\350\241\331\071\006\227\365\156\215\002\220\214\024\173\077
\200\315\033\234\272\304\130\162\043\257\266\126\237\306\172\102
\063\051\007\077\202\311\346\037\005\015\315\114\050\066\213\323
\310\076\034\306\210\357\136\356\211\144\351\035\353\332\211\176
\062\246\151\321\335\314\210\237\321\320\311\146\041\334\006\147
\305\224\172\232\155\142\114\175\314\340\144\200\262\236\107\216
\243\002\003\001\000\001\243\102\060\100\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125
\035\016\004\026\004\024\210\150\277\340\216\065\304\073\070\153
\142\367\050\073\204\201\310\014\327\115\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\002\001\000\073\002
\215\313\074\060\350\156\240\255\362\163\263\137\236\045\023\004
\005\323\366\343\213\273\013\171\316\123\336\344\226\305\321\257
\163\274\325\303\320\100\125\174\100\177\315\033\137\011\325\362
\174\237\150\035\273\135\316\172\071\302\214\326\230\173\305\203
\125\250\325\175\100\312\340\036\367\211\136\143\135\241\023\302
\135\212\266\212\174\000\363\043\303\355\205\137\161\166\360\150
\143\252\105\041\071\110\141\170\066\334\361\103\223\324\045\307
\362\200\145\341\123\002\165\121\374\172\072\357\067\253\204\050
\127\014\330\324\324\231\126\154\343\242\376\131\204\264\061\350
\063\370\144\224\224\121\227\253\071\305\113\355\332\335\200\013
\157\174\051\015\304\216\212\162\015\347\123\024\262\140\101\075
\204\221\061\150\075\047\104\333\345\336\364\372\143\105\310\114
\076\230\365\077\101\272\116\313\067\015\272\146\230\361\335\313
\237\134\367\124\066\202\153\054\274\023\141\227\102\370\170\273
\314\310\242\237\312\360\150\275\153\035\262\337\215\157\007\235
\332\216\147\307\107\036\312\271\277\052\102\221\267\143\123\146
\361\102\243\341\364\132\115\130\153\265\344\244\063\255\134\160
\035\334\340\362\353\163\024\221\232\003\301\352\000\145\274\007
\374\317\022\021\042\054\256\240\275\072\340\242\052\330\131\351
\051\323\030\065\244\254\021\137\031\265\265\033\377\042\112\134
\306\172\344\027\357\040\251\247\364\077\255\212\247\232\004\045
\235\016\312\067\346\120\375\214\102\051\004\232\354\271\317\113
\162\275\342\010\066\257\043\057\142\345\312\001\323\160\333\174
\202\043\054\026\061\014\306\066\007\220\172\261\037\147\130\304
\073\130\131\211\260\214\214\120\263\330\206\313\150\243\304\012
\347\151\113\040\316\301\036\126\113\225\251\043\150\330\060\330
\303\353\260\125\121\315\345\375\053\270\365\273\021\237\123\124
\366\064\031\214\171\011\066\312\141\027\045\027\013\202\230\163
\014\167\164\303\325\015\307\250\022\114\307\247\124\161\107\056
\054\032\175\311\343\053\073\110\336\047\204\247\143\066\263\175
\217\240\144\071\044\015\075\173\207\257\146\134\164\033\113\163
\262\345\214\360\206\231\270\345\305\337\204\301\267\353

END

#

```

Trust for Certificate "DigiNotar Root CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "DigiNotar Root CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\300\140\355\104\313\330\201\275\016\370\154\013\242\207\335\317
\201\147\107\214
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\172\171\124\115\007\222\073\133\377\101\360\016\307\071\242\230
END
CKA_ISSUER MULTILINE_OCTAL
\060\137\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\022\060\020\006\003\125\004\012\023\011\104\151\147\151\116\157
\164\141\162\061\032\060\030\006\003\125\004\003\023\021\104\151
\147\151\116\157\164\141\162\040\122\157\157\164\040\103\101\061
\040\060\036\006\011\052\206\110\206\367\015\001\011\001\026\021
\151\156\146\157\100\144\151\147\151\156\157\164\141\162\056\156
\154
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\014\166\332\234\221\014\116\054\236\376\025\320\130\223
\074\114
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Network Solutions Certificate Authority"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Network Solutions Certificate Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\142\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\116\145\164\167\157\162
\153\040\123\157\154\165\164\151\157\156\163\040\114\056\114\056
\103\056\061\060\060\056\006\003\125\004\003\023\047\116\145\164
\167\157\162\153\040\123\157\154\165\164\151\157\156\163\040\103
\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157

```

```
\162\151\164\171
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\142\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\041\060\037\006\003\125\004\012\023\030\116\145\164\167\157\162
\153\040\123\157\154\165\164\151\157\156\163\040\114\056\114\056
\103\056\061\060\060\056\006\003\125\004\003\023\047\116\145\164
\167\157\162\153\040\123\157\154\165\164\151\157\156\163\040\103
\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157
\162\151\164\171
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\127\313\063\157\302\134\026\346\107\026\027\343\220\061
\150\340
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\346\060\202\002\316\240\003\002\001\002\002\020\127
\313\063\157\302\134\026\346\107\026\027\343\220\061\150\340\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\142
\061\013\060\011\006\003\125\004\006\023\002\125\123\061\041\060
\037\006\003\125\004\012\023\030\116\145\164\167\157\162\153\040
\123\157\154\165\164\151\157\156\163\040\114\056\114\056\103\056
\061\060\060\056\006\003\125\004\003\023\047\116\145\164\167\157
\162\153\040\123\157\154\165\164\151\157\156\163\040\103\145\162
\164\151\146\151\143\141\164\145\040\101\165\164\150\157\162\151
\164\171\060\036\027\015\060\066\061\062\060\061\060\060\060\060
\060\060\132\027\015\062\071\061\062\063\061\062\063\065\071\065
\071\132\060\142\061\013\060\011\006\003\125\004\006\023\002\125
\123\061\041\060\037\006\003\125\004\012\023\030\116\145\164\167
\157\162\153\040\123\157\154\165\164\151\157\156\163\040\114\056
\114\056\103\056\061\060\060\056\006\003\125\004\003\023\047\116
\145\164\167\157\162\153\040\123\157\154\165\164\151\157\156\163
\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165\164
\150\157\162\151\164\171\060\202\001\042\060\015\006\011\052\206
\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202
\001\012\002\202\001\001\000\344\274\176\222\060\155\306\330\216
\053\013\274\106\316\340\047\226\336\336\371\372\022\323\074\063
\163\263\004\057\274\161\214\345\237\266\042\140\076\137\135\316
\011\377\202\014\033\232\121\120\032\046\211\335\325\141\135\031
\334\022\017\055\012\242\103\135\027\320\064\222\040\352\163\317
\070\054\006\046\011\172\162\367\372\120\062\370\302\223\323\151
\242\043\316\101\261\314\344\325\037\066\321\212\072\370\214\143
\342\024\131\151\355\015\323\177\153\350\270\003\345\117\152\345
\230\143\151\110\005\276\056\377\063\266\351\227\131\151\370\147
\031\256\223\141\226\104\025\323\162\260\077\274\152\175\354\110
\177\215\303\253\252\161\053\123\151\101\123\064\265\260\271\305
```


\006\012\304\260\105\365\101\135\156\211\105\173\075\073\046\214
\164\302\345\322\321\175\262\021\324\373\130\062\042\232\200\311
\334\375\014\351\177\136\003\227\316\073\000\024\207\047\160\070
\251\216\156\263\047\166\230\121\340\005\343\041\253\032\325\205
\042\074\051\265\232\026\305\200\250\364\273\153\060\217\057\106
\002\242\261\014\042\340\323\002\003\001\000\001\243\201\227\060
\201\224\060\035\006\003\125\035\016\004\026\004\024\041\060\311
\373\000\327\116\230\332\207\252\052\320\247\056\261\100\061\247
\114\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001
\006\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001
\001\377\060\122\006\003\125\035\037\004\113\060\111\060\107\240
\105\240\103\206\101\150\164\164\160\072\057\057\143\162\154\056
\156\145\164\163\157\154\163\163\154\056\143\157\155\057\116\145
\164\167\157\162\153\123\157\154\165\164\151\157\156\163\103\145
\162\164\151\146\151\143\141\164\145\101\165\164\150\157\162\151
\164\171\056\143\162\154\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\001\001\000\273\256\113\347\267\127
\353\177\252\055\267\163\107\205\152\301\344\245\035\344\347\074
\351\364\131\145\167\265\172\133\132\215\045\066\340\172\227\056
\070\300\127\140\203\230\006\203\237\271\166\172\156\120\340\272
\210\054\374\105\314\030\260\231\225\121\016\354\035\270\210\377
\207\120\034\202\302\343\340\062\200\277\240\013\107\310\303\061
\357\231\147\062\200\117\027\041\171\014\151\134\336\136\064\256
\002\265\046\352\120\337\177\030\145\054\311\362\143\341\251\007
\376\174\161\037\153\063\044\152\036\005\367\005\150\300\152\022
\313\056\136\141\313\256\050\323\176\302\264\146\221\046\137\074
\056\044\137\313\130\017\353\050\354\257\021\226\363\334\173\157
\300\247\210\362\123\167\263\140\136\256\256\050\332\065\054\157
\064\105\323\046\341\336\354\133\117\047\153\026\174\275\104\004
\030\202\263\211\171\027\020\161\075\172\242\026\116\365\001\315
\244\154\145\150\241\111\166\134\103\311\330\274\066\147\154\245
\224\265\324\314\271\275\152\065\126\041\336\330\303\353\373\313
\244\140\114\260\125\240\240\173\127\262

END

#

Trust for Certificate "Network Solutions Certificate Authority"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Network Solutions Certificate Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\164\370\243\303\357\347\263\220\006\113\203\220\074\041\144\140
\040\345\337\316
END
CKA_CERT_MD5_HASH

MULTILINE_OCTAL

\323\363\246\026\300\372\153\035\131\261\055\226\115\016\021\056

END

CKA_ISSUER MULTILINE_OCTAL

\060\142\061\013\060\011\006\003\125\004\006\023\002\125\123\061

\041\060\037\006\003\125\004\012\023\030\116\145\164\167\157\162

\153\040\123\157\154\165\164\151\157\156\163\040\114\056\114\056

\103\056\061\060\060\056\006\003\125\004\003\023\047\116\145\164

\167\157\162\153\040\123\157\154\165\164\151\157\156\163\040\103

\145\162\164\151\146\151\143\141\164\145\040\101\165\164\150\157

\162\151\164\171

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\127\313\063\157\302\134\026\346\107\026\027\343\220\061

\150\340

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "WellsSecure Public Root Certificate Authority"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL

CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "WellsSecure Public Root Certificate Authority"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\205\061\013\060\011\006\003\125\004\006\023\002\125\123

\061\040\060\036\006\003\125\004\012\014\027\127\145\154\154\163

\040\106\141\162\147\157\040\127\145\154\154\163\123\145\143\165

\162\145\061\034\060\032\006\003\125\004\013\014\023\127\145\154

\154\163\040\106\141\162\147\157\040\102\141\156\153\040\116\101

\061\066\060\064\006\003\125\004\003\014\055\127\145\154\154\163

\123\145\143\165\162\145\040\120\165\142\154\151\143\040\122\157

\157\164\040\103\145\162\164\151\146\151\143\141\164\145\040\101

\165\164\150\157\162\151\164\171

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\205\061\013\060\011\006\003\125\004\006\023\002\125\123

\061\040\060\036\006\003\125\004\012\014\027\127\145\154\154\163

\040\106\141\162\147\157\040\127\145\154\154\163\123\145\143\165

\162\145\061\034\060\032\006\003\125\004\013\014\023\127\145\154

\154\163\040\106\141\162\147\157\040\102\141\156\153\040\116\101
\061\066\060\064\006\003\125\004\003\014\055\127\145\154\154\163
\123\145\143\165\162\145\040\120\165\142\154\151\143\040\122\157
\157\164\040\103\145\162\164\151\146\151\143\141\164\145\040\101
\165\164\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\275\060\202\003\245\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\201\205\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\040\060\036\006\003\125\004\012\014\027\127\145\154\154\163\040
\106\141\162\147\157\040\127\145\154\154\163\123\145\143\165\162
\145\061\034\060\032\006\003\125\004\013\014\023\127\145\154\154
\163\040\106\141\162\147\157\040\102\141\156\153\040\116\101\061
\066\060\064\006\003\125\004\003\014\055\127\145\154\154\163\123
\145\143\165\162\145\040\120\165\142\154\151\143\040\122\157\157
\164\040\103\145\162\164\151\146\151\143\141\164\145\040\101\165
\164\150\157\162\151\164\171\060\036\027\015\060\067\061\062\061
\063\061\067\060\067\065\064\132\027\015\062\062\061\062\061\064
\060\060\060\067\065\064\132\060\201\205\061\013\060\011\006\003
\125\004\006\023\002\125\123\061\040\060\036\006\003\125\004\012
\014\027\127\145\154\154\163\040\106\141\162\147\157\040\127\145
\154\154\163\123\145\143\165\162\145\061\034\060\032\006\003\125
\004\013\014\023\127\145\154\154\163\040\106\141\162\147\157\040
\102\141\156\153\040\116\101\061\066\060\064\006\003\125\004\003
\014\055\127\145\154\154\163\123\145\143\165\162\145\040\120\165
\142\154\151\143\040\122\157\157\164\040\103\145\162\164\151\146
\151\143\141\164\145\040\101\165\164\150\157\162\151\164\171\060
\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001
\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000
\356\157\264\275\171\342\217\010\041\236\070\004\101\045\357\253
\133\034\123\222\254\155\236\335\302\304\056\105\224\003\065\210
\147\164\127\343\337\214\270\247\166\217\073\367\250\304\333\051
\143\016\221\150\066\212\227\216\212\161\150\011\007\344\350\324
\016\117\370\326\053\114\244\026\371\357\103\230\217\263\236\122
\337\155\221\071\217\070\275\167\213\103\143\353\267\223\374\060
\114\034\001\223\266\023\373\367\241\037\277\045\341\164\067\054
\036\244\136\074\150\370\113\277\015\271\036\056\066\350\251\344
\247\370\017\313\202\165\174\065\055\042\326\302\277\013\363\264
\374\154\225\141\036\127\327\004\201\062\203\122\171\346\203\143
\317\267\313\143\213\021\342\275\136\353\366\215\355\225\162\050
\264\254\022\142\351\112\063\346\203\062\256\005\165\225\275\204
\225\333\052\134\233\216\056\014\270\201\053\101\346\070\126\237
\111\233\154\166\372\212\135\367\001\171\201\174\301\203\100\005

\376\161\375\014\077\314\116\140\011\016\145\107\020\057\001\300
\005\077\217\370\263\101\357\132\102\176\131\357\322\227\014\145
\002\003\001\000\001\243\202\001\064\060\202\001\060\060\017\006
\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\071
\006\003\125\035\037\004\062\060\060\060\056\240\054\240\052\206
\050\150\164\164\160\072\057\057\143\162\154\056\160\153\151\056
\167\145\154\154\163\146\141\162\147\157\056\143\157\155\057\167
\163\160\162\143\141\056\143\162\154\060\016\006\003\125\035\017
\001\001\377\004\004\003\002\001\306\060\035\006\003\125\035\016
\004\026\004\024\046\225\031\020\331\350\241\227\221\377\334\031
\331\265\004\076\322\163\012\152\060\201\262\006\003\125\035\043
\004\201\252\060\201\247\200\024\046\225\031\020\331\350\241\227
\221\377\334\031\331\265\004\076\322\163\012\152\241\201\213\244
\201\210\060\201\205\061\013\060\011\006\003\125\004\006\023\002
\125\123\061\040\060\036\006\003\125\004\012\014\027\127\145\154
\154\163\040\106\141\162\147\157\040\127\145\154\154\163\123\145
\143\165\162\145\061\034\060\032\006\003\125\004\013\014\023\127
\145\154\154\163\040\106\141\162\147\157\040\102\141\156\153\040
\116\101\061\066\060\064\006\003\125\004\003\014\055\127\145\154
\154\163\123\145\143\165\162\145\040\120\165\142\154\151\143\040
\122\157\157\164\040\103\145\162\164\151\146\151\143\141\164\145
\040\101\165\164\150\157\162\151\164\171\202\001\001\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001
\000\271\025\261\104\221\314\043\310\053\115\167\343\370\232\173
\047\015\315\162\273\231\000\312\174\146\031\120\306\325\230\355
\253\277\003\132\345\115\345\036\310\117\161\227\206\325\343\035
\375\220\311\074\165\167\127\172\175\370\336\364\324\325\367\225
\346\164\156\035\074\256\174\235\333\002\003\005\054\161\113\045
\076\007\343\136\232\365\146\027\051\210\032\070\237\317\252\101
\003\204\227\153\223\070\172\312\060\104\033\044\104\063\320\344
\321\334\050\070\364\023\103\065\065\051\143\250\174\242\265\255
\070\244\355\255\375\306\232\037\377\227\163\376\373\263\065\247
\223\206\306\166\221\000\346\254\121\026\304\047\062\134\333\163
\332\245\223\127\216\076\155\065\046\010\131\325\347\104\327\166
\040\143\347\254\023\147\303\155\261\160\106\174\325\226\021\075
\211\157\135\250\241\353\215\012\332\303\035\063\154\243\352\147
\031\232\231\177\113\075\203\121\052\035\312\057\206\014\242\176
\020\055\053\324\026\225\013\007\252\056\024\222\111\267\051\157
\330\155\061\175\365\374\241\020\007\207\316\057\131\334\076\130
\333
END

#

Trust for Certificate "WellsSecure Public Root Certificate Authority"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE

```

CKA_LABEL UTF8 "WellsSecure Public Root Certificate Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\347\264\366\235\141\354\220\151\333\176\220\247\100\032\074\364
\175\117\350\356
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\025\254\245\302\222\055\171\274\350\177\313\147\355\002\317\066
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\205\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\040\060\036\006\003\125\004\012\014\027\127\145\154\154\163
\040\106\141\162\147\157\040\127\145\154\154\163\123\145\143\165
\162\145\061\034\060\032\006\003\125\004\013\014\023\127\145\154
\154\163\040\106\141\162\147\157\040\102\141\156\153\040\116\101
\061\066\060\064\006\003\125\004\003\014\055\127\145\154\154\163
\123\145\143\165\162\145\040\120\165\142\154\151\143\040\122\157
\157\164\040\103\145\162\164\151\146\151\143\141\164\145\040\101
\165\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "COMODO ECC Certification Authority"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "COMODO ECC Certification Authority"
CKA_CERTIFICATE_TYPE
CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\205\061\013\060\011\006\003\125\004\006\023\002\107\102
\061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\040\103\101\040\114\151\155\151\164\145\144\061\053\060\051\006
\003\125\004\003\023\042\103\117\115\117\104\117\040\105\103\103
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171

```

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\205\061\013\060\011\006\003\125\004\006\023\002\107\102
\061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\040\103\101\040\114\151\155\151\164\145\144\061\053\060\051\006
\003\125\004\003\023\042\103\117\115\117\104\117\040\105\103\103
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\037\107\257\252\142\000\160\120\124\114\001\236\233\143
\231\052

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\211\060\202\002\017\240\003\002\001\002\002\020\037
\107\257\252\142\000\160\120\124\114\001\236\233\143\231\052\060
\012\006\010\052\206\110\316\075\004\003\003\060\201\205\061\013
\060\011\006\003\125\004\006\023\002\107\102\061\033\060\031\006
\003\125\004\010\023\022\107\162\145\141\164\145\162\040\115\141
\156\143\150\145\163\164\145\162\061\020\060\016\006\003\125\004
\007\023\007\123\141\154\146\157\162\144\061\032\060\030\006\003
\125\004\012\023\021\103\117\115\117\104\117\040\103\101\040\114
\151\155\151\164\145\144\061\053\060\051\006\003\125\004\003\023
\042\103\117\115\117\104\117\040\105\103\103\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\060\036\027\015\060\070\060\063\060\066\060\060\060
\060\060\060\132\027\015\063\070\060\061\061\070\062\063\065\071
\065\071\132\060\201\205\061\013\060\011\006\003\125\004\006\023
\002\107\102\061\033\060\031\006\003\125\004\010\023\022\107\162
\145\141\164\145\162\040\115\141\156\143\150\145\163\164\145\162
\061\020\060\016\006\003\125\004\007\023\007\123\141\154\146\157
\162\144\061\032\060\030\006\003\125\004\012\023\021\103\117\115
\117\104\117\040\103\101\040\114\151\155\151\164\145\144\061\053
\060\051\006\003\125\004\003\023\042\103\117\115\117\104\117\040
\105\103\103\040\103\145\162\164\151\146\151\143\141\164\151\157
\156\040\101\165\164\150\157\162\151\164\171\060\166\060\020\006
\007\052\206\110\316\075\002\001\006\005\053\201\004\000\042\003
\142\000\004\003\107\173\057\165\311\202\025\205\373\165\344\221
\026\324\253\142\231\365\076\122\013\006\316\101\000\177\227\341
\012\044\074\035\001\004\356\075\322\215\011\227\014\340\165\344
\372\373\167\212\052\365\003\140\113\066\213\026\043\026\255\011
\161\364\112\364\050\120\264\376\210\034\156\077\154\057\057\011
\131\133\245\133\013\063\231\342\303\075\211\371\152\054\357\262

```
\323\006\351\243\102\060\100\060\035\006\003\125\035\016\004\026
\004\024\165\161\247\031\110\031\274\235\235\352\101\107\337\224
\304\110\167\231\323\171\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\012\006\010\052\206\110\316\075
\004\003\003\003\150\000\060\145\002\061\000\357\003\133\172\254
\267\170\012\162\267\210\337\377\265\106\024\011\012\372\240\346
\175\010\306\032\207\275\030\250\163\275\046\312\140\014\235\316
\231\237\317\134\017\060\341\276\024\061\352\002\060\024\364\223
\074\111\247\063\172\220\106\107\263\143\175\023\233\116\267\157
\030\067\200\123\376\335\040\340\065\232\066\321\307\001\271\346
\334\335\363\377\035\054\072\026\127\331\222\071\326
END
```

#

```
Trust for Certificate "COMODO ECC Certification Authority"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "COMODO ECC Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\237\164\116\237\053\115\272\354\017\061\054\120\266\126\073\216
\055\223\303\021
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\174\142\377\164\235\061\123\136\150\112\325\170\252\036\277\043
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\205\061\013\060\011\006\003\125\004\006\023\002\107\102
\061\033\060\031\006\003\125\004\010\023\022\107\162\145\141\164
\145\162\040\115\141\156\143\150\145\163\164\145\162\061\020\060
\016\006\003\125\004\007\023\007\123\141\154\146\157\162\144\061
\032\060\030\006\003\125\004\012\023\021\103\117\115\117\104\117
\040\103\101\040\114\151\155\151\164\145\144\061\053\060\051\006
\003\125\004\003\023\042\103\117\115\117\104\117\040\105\103\103
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\037\107\257\252\142\000\160\120\124\114\001\236\233\143
\231\052
```

END

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "MD5 Collisions Forged Rogue CA 25c3"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "MD5 Collisions Forged Rogue CA 25c3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\074\061\072\060\070\006\003\125\004\003\023\061\115\104\065
\040\103\157\154\154\151\163\151\157\156\163\040\111\156\143\056
\040\050\150\164\164\160\072\057\057\167\167\167\056\160\150\162
\145\145\144\157\155\056\157\162\147\057\155\144\065\051
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\055\060
\053\006\003\125\004\003\023\044\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\107\154\157\142\141\154\040\145\102
\165\163\151\156\145\163\163\040\103\101\055\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\102
END
CKA_VALUE MULTILINE_OCTAL
\060\202\004\062\060\202\003\233\240\003\002\001\002\002\001\102
\060\015\006\011\052\206\110\206\367\015\001\001\004\005\000\060
\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061\034
\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141\170
\040\123\145\143\165\162\145\040\111\156\143\056\061\055\060\053
\006\003\125\004\003\023\044\105\161\165\151\146\141\170\040\123
\145\143\165\162\145\040\107\154\157\142\141\154\040\145\102\165
\163\151\156\145\163\163\040\103\101\055\061\060\036\027\015\060
\064\060\067\063\061\060\060\060\060\060\061\132\027\015\060\064
\060\071\060\062\060\060\060\060\060\061\132\060\074\061\072\060
\070\006\003\125\004\003\023\061\115\104\065\040\103\157\154\154
\151\163\151\157\156\163\040\111\156\143\056\040\050\150\164\164
\160\072\057\057\167\167\167\056\160\150\162\145\145\144\157\155
\056\157\162\147\057\155\144\065\051\060\201\237\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\201\215\000\060
\201\211\002\201\201\000\272\246\131\311\054\050\326\052\260\370
\355\237\106\244\244\067\356\016\031\150\131\321\263\003\231\121
\326\026\232\136\067\153\025\340\016\113\365\204\144\370\243\333
```


\101\157\065\325\233\025\037\333\304\070\122\160\201\227\136\217
\240\265\367\176\071\360\062\254\036\255\104\322\263\372\110\303
\316\221\233\354\364\234\174\341\132\365\310\067\153\232\203\336
\347\312\040\227\061\102\163\025\221\150\364\210\257\371\050\050
\305\351\017\163\260\027\113\023\114\231\165\320\104\346\176\010
\154\032\362\117\033\101\002\003\001\000\001\243\202\002\044\060
\202\002\040\060\013\006\003\125\035\017\004\004\003\002\001\306
\060\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001
\377\060\035\006\003\125\035\016\004\026\004\024\247\004\140\037
\253\162\103\010\305\177\010\220\125\126\034\326\316\346\070\353
\060\037\006\003\125\035\043\004\030\060\026\200\024\276\250\240
\164\162\120\153\104\267\311\043\330\373\250\377\263\127\153\150
\154\060\202\001\276\006\011\140\206\110\001\206\370\102\001\015
\004\202\001\257\026\202\001\253\063\000\000\000\047\136\071\340
\211\141\017\116\243\305\105\013\066\273\001\321\123\252\303\010
\217\157\370\117\076\207\207\104\021\334\140\340\337\222\125\371
\270\163\033\124\223\305\237\320\106\304\140\266\065\142\315\271
\257\034\250\151\032\311\133\074\226\067\300\355\147\357\273\376
\300\213\234\120\057\051\275\203\042\236\216\010\372\254\023\160
\242\130\177\142\142\212\021\367\211\366\337\266\147\131\163\026
\373\143\026\212\264\221\070\316\056\365\266\276\114\244\224\111
\344\145\021\012\102\025\311\301\060\342\151\325\105\175\245\046
\273\271\141\354\142\144\360\071\341\347\274\150\330\120\121\236
\035\140\323\321\243\247\012\370\003\040\241\160\001\027\221\066
\117\002\160\061\206\203\335\367\017\330\007\035\021\263\023\004
\245\334\360\256\120\261\050\016\143\151\052\014\202\157\217\107
\063\337\154\242\006\222\361\117\105\276\331\060\066\243\053\214
\326\167\256\065\143\177\116\114\232\223\110\066\331\237\002\003
\001\000\001\243\201\275\060\201\272\060\016\006\003\125\035\017
\001\001\377\004\004\003\002\004\360\060\035\006\003\125\035\016
\004\026\004\024\315\246\203\372\245\140\067\367\226\067\027\051
\336\101\170\361\207\211\125\347\060\073\006\003\125\035\037\004
\064\060\062\060\060\240\056\240\054\206\052\150\164\164\160\072
\057\057\143\162\154\056\147\145\157\164\162\165\163\164\056\143
\157\155\057\143\162\154\163\057\147\154\157\142\141\154\143\141
\061\056\143\162\154\060\037\006\003\125\035\043\004\030\060\026
\200\024\276\250\240\164\162\120\153\104\267\311\043\330\373\250
\377\263\127\153\150\154\060\035\006\003\125\035\045\004\026\060
\024\006\010\053\006\001\005\005\007\003\001\006\010\053\006\001
\005\005\007\003\002\060\014\006\003\125\035\023\001\001\377\004
\002\060\000\060\015\006\011\052\206\110\206\367\015\001\001\004
\005\000\003\201\201\000\247\041\002\215\321\016\242\200\167\045
\375\103\140\025\217\354\357\220\107\324\204\102\025\046\021\034
\315\302\074\020\051\251\266\337\253\127\165\221\332\345\053\263
\220\105\034\060\143\126\077\212\331\120\372\355\130\154\300\145
\254\146\127\336\034\306\166\073\365\000\016\216\105\316\177\114
\220\354\053\306\315\263\264\217\142\320\376\267\305\046\162\104
\355\366\230\133\256\313\321\225\365\332\010\276\150\106\261\165

```
\310\354\035\217\036\172\224\361\252\123\170\242\105\256\124\352
\321\236\164\310\166\147
END
```

```
#
```

```
Trust for Certificate "MD5 Collisions Forged Rogue CA 25c3"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "MD5 Collisions Forged Rogue CA 25c3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\144\043\023\176\134\123\326\112\246\144\205\355\066\124\365\253
\005\132\213\212
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\026\172\023\025\271\027\071\243\361\005\152\346\076\331\072\070
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\034\060\032\006\003\125\004\012\023\023\105\161\165\151\146\141
\170\040\123\145\143\165\162\145\040\111\156\143\056\061\055\060
\053\006\003\125\004\003\023\044\105\161\165\151\146\141\170\040
\123\145\143\165\162\145\040\107\154\157\142\141\154\040\145\102
\165\163\151\156\145\163\163\040\103\101\055\061
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\102
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_UNTRUSTED
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_UNTRUSTED
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_UNTRUSTED
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "IGC/A"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IGC/A"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\205\061\013\060\011\006\003\125\004\006\023\002\106\122
\061\017\060\015\006\003\125\004\010\023\006\106\162\141\156\143
```

\145\061\016\060\014\006\003\125\004\007\023\005\120\141\162\151
\163\061\020\060\016\006\003\125\004\012\023\007\120\115\057\123
\107\104\116\061\016\060\014\006\003\125\004\013\023\005\104\103
\123\123\111\061\016\060\014\006\003\125\004\003\023\005\111\107
\103\057\101\061\043\060\041\006\011\052\206\110\206\367\015\001
\011\001\026\024\151\147\143\141\100\163\147\144\156\056\160\155
\056\147\157\165\166\056\146\162

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\205\061\013\060\011\006\003\125\004\006\023\002\106\122
\061\017\060\015\006\003\125\004\010\023\006\106\162\141\156\143
\145\061\016\060\014\006\003\125\004\007\023\005\120\141\162\151
\163\061\020\060\016\006\003\125\004\012\023\007\120\115\057\123
\107\104\116\061\016\060\014\006\003\125\004\013\023\005\104\103
\123\123\111\061\016\060\014\006\003\125\004\003\023\005\111\107
\103\057\101\061\043\060\041\006\011\052\206\110\206\367\015\001
\011\001\026\024\151\147\143\141\100\163\147\144\156\056\160\155
\056\147\157\165\166\056\146\162

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\005\071\021\105\020\224

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\002\060\202\002\352\240\003\002\001\002\002\005\071
\021\105\020\224\060\015\006\011\052\206\110\206\367\015\001\001
\005\005\000\060\201\205\061\013\060\011\006\003\125\004\006\023
\002\106\122\061\017\060\015\006\003\125\004\010\023\006\106\162
\141\156\143\145\061\016\060\014\006\003\125\004\007\023\005\120
\141\162\151\163\061\020\060\016\006\003\125\004\012\023\007\120
\115\057\123\107\104\116\061\016\060\014\006\003\125\004\013\023
\005\104\103\123\123\111\061\016\060\014\006\003\125\004\003\023
\005\111\107\103\057\101\061\043\060\041\006\011\052\206\110\206
\367\015\001\011\001\026\024\151\147\143\141\100\163\147\144\156
\056\160\155\056\147\157\165\166\056\146\162\060\036\027\015\060
\062\061\062\061\063\061\064\062\071\062\063\132\027\015\062\060
\061\060\061\067\061\064\062\071\062\062\132\060\201\205\061\013
\060\011\006\003\125\004\006\023\002\106\122\061\017\060\015\006
\003\125\004\010\023\006\106\162\141\156\143\145\061\016\060\014
\006\003\125\004\007\023\005\120\141\162\151\163\061\020\060\016
\006\003\125\004\012\023\007\120\115\057\123\107\104\116\061\016
\060\014\006\003\125\004\013\023\005\104\103\123\123\111\061\016
\060\014\006\003\125\004\003\023\005\111\107\103\057\101\061\043
\060\041\006\011\052\206\110\206\367\015\001\011\001\026\024\151
\147\143\141\100\163\147\144\156\056\160\155\056\147\157\165\166
\056\146\162\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002

\202\001\001\000\262\037\321\320\142\305\063\073\300\004\206\210
\263\334\370\210\367\375\337\103\337\172\215\232\111\134\366\116
\252\314\034\271\241\353\047\211\362\106\351\073\112\161\325\035
\216\055\317\346\255\253\143\120\307\124\013\156\022\311\220\066
\306\330\057\332\221\252\150\305\162\376\027\012\262\027\176\171
\265\062\210\160\312\160\300\226\112\216\344\125\315\035\047\224
\277\316\162\052\354\134\371\163\040\376\275\367\056\211\147\270
\273\107\163\022\367\321\065\151\072\362\012\271\256\377\106\102
\106\242\277\241\205\032\371\277\344\377\111\205\367\243\160\206
\062\034\135\237\140\367\251\255\245\377\317\321\064\371\175\133
\027\306\334\326\016\050\153\302\335\361\365\063\150\235\116\374
\207\174\066\022\326\243\200\350\103\015\125\141\224\352\144\067
\107\352\167\312\320\262\130\005\303\135\176\261\250\106\220\061
\126\316\160\052\226\262\060\270\167\346\171\300\275\051\073\375
\224\167\114\275\040\315\101\045\340\056\307\033\273\356\244\004
\101\322\135\255\022\152\212\233\107\373\311\335\106\100\341\235
\074\063\320\265\002\003\001\000\001\243\167\060\165\060\017\006
\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\013
\006\003\125\035\017\004\004\003\002\001\106\060\025\006\003\125
\035\040\004\016\060\014\060\012\006\010\052\201\172\001\171\001
\001\001\060\035\006\003\125\035\016\004\026\004\024\243\005\057
\030\140\120\302\211\012\335\053\041\117\377\216\116\250\060\061
\066\060\037\006\003\125\035\043\004\030\060\026\200\024\243\005
\057\030\140\120\302\211\012\335\053\041\117\377\216\116\250\060
\061\066\060\015\006\011\052\206\110\206\367\015\001\001\005\005
\000\003\202\001\001\000\005\334\046\330\372\167\025\104\150\374
\057\146\072\164\340\135\344\051\377\006\007\023\204\112\253\317
\155\240\037\121\224\370\111\313\164\066\024\274\025\335\333\211
\057\335\217\240\135\174\365\022\353\237\236\070\244\107\314\263
\226\331\276\234\045\253\003\176\063\017\225\201\015\375\026\340
\210\276\067\360\154\135\320\061\233\062\053\135\027\145\223\230
\140\274\156\217\261\250\074\036\331\034\363\251\046\102\371\144
\035\302\347\222\366\364\036\132\252\031\122\135\257\350\242\367
\140\240\366\215\360\211\365\156\340\012\005\001\225\311\213\040
\012\272\132\374\232\054\074\275\303\267\311\135\170\045\005\077
\126\024\233\014\332\373\072\110\376\227\151\136\312\020\206\367
\116\226\004\010\115\354\260\276\135\334\073\216\117\301\375\232
\066\064\232\114\124\176\027\003\110\225\010\021\034\007\157\205
\010\176\135\115\304\235\333\373\256\316\262\321\263\270\203\154
\035\262\263\171\361\330\160\231\176\360\023\002\316\136\335\121
\323\337\066\201\241\033\170\057\161\263\361\131\114\106\030\050
\253\205\322\140\126\132

END

#

Trust for Certificate "IGC/A"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

```

CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "IGC/A"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\140\326\211\164\265\302\145\236\212\017\301\210\174\210\322\106
\151\033\030\054
END
CKA_CERT_MD5_HASH
MULTILINE_OCTAL
\014\177\335\152\364\052\271\310\233\275\040\176\251\333\134\067
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\205\061\013\060\011\006\003\125\004\006\023\002\106\122
\061\017\060\015\006\003\125\004\010\023\006\106\162\141\156\143
\145\061\016\060\014\006\003\125\004\007\023\005\120\141\162\151
\163\061\020\060\016\006\003\125\004\012\023\007\120\115\057\123
\107\104\116\061\016\060\014\006\003\125\004\013\023\005\104\103
\123\123\111\061\016\060\014\006\003\125\004\003\023\005\111\107
\103\057\101\061\043\060\041\006\011\052\206\110\206\367\015\001
\011\001\026\024\151\147\143\141\100\163\147\144\156\056\160\155
\056\147\157\165\166\056\146\162
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\005\071\021\105\020\224
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE

#
# Certificate "Security Communication EV RootCA1"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Security Communication EV RootCA1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\140\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\045\060\043\006\003\125\004\012\023\034\123\105\103\117\115\040
\124\162\165\163\164\040\123\171\163\164\145\155\163\040\103\117
\056\054\114\124\104\056\061\052\060\050\006\003\125\004\013\023
\041\123\145\143\165\162\151\164\171\040\103\157\155\155\165\156
\151\143\141\164\151\157\156\040\105\126\040\122\157\157\164\103
\101\061

```

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\140\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\045\060\043\006\003\125\004\012\023\034\123\105\103\117\115\040
\124\162\165\163\164\040\123\171\163\164\145\155\163\040\103\117
\056\054\114\124\104\056\061\052\060\050\006\003\125\004\013\023
\041\123\145\143\165\162\151\164\171\040\103\157\155\155\165\156
\151\143\141\164\151\157\156\040\105\126\040\122\157\157\164\103
\101\061

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\000

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\175\060\202\002\145\240\003\002\001\002\002\001\000
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\140\061\013\060\011\006\003\125\004\006\023\002\112\120\061\045
\060\043\006\003\125\004\012\023\034\123\105\103\117\115\040\124
\162\165\163\164\040\123\171\163\164\145\155\163\040\103\117\056
\054\114\124\104\056\061\052\060\050\006\003\125\004\013\023\041
\123\145\143\165\162\151\164\171\040\103\157\155\155\165\156\151
\143\141\164\151\157\156\040\105\126\040\122\157\157\164\103\101
\061\060\036\027\015\060\067\060\066\060\066\060\062\061\062\063
\062\132\027\015\063\067\060\066\060\066\060\062\061\062\063\062
\132\060\140\061\013\060\011\006\003\125\004\006\023\002\112\120
\061\045\060\043\006\003\125\004\012\023\034\123\105\103\117\115
\040\124\162\165\163\164\040\123\171\163\164\145\155\163\040\103
\117\056\054\114\124\104\056\061\052\060\050\006\003\125\004\013
\023\041\123\145\143\165\162\151\164\171\040\103\157\155\155\165
\156\151\143\141\164\151\157\156\040\105\126\040\122\157\157\164
\103\101\061\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002
\202\001\001\000\274\177\354\127\233\044\340\376\234\272\102\171
\251\210\212\372\200\340\365\007\051\103\352\216\012\064\066\215
\034\372\247\265\071\170\377\227\165\367\057\344\252\153\004\204
\104\312\246\342\150\216\375\125\120\142\017\244\161\016\316\007
\070\055\102\205\120\255\074\226\157\213\325\242\016\317\336\111
\211\075\326\144\056\070\345\036\154\265\127\212\236\357\110\016
\315\172\151\026\207\104\265\220\344\006\235\256\241\004\227\130
\171\357\040\112\202\153\214\042\277\354\037\017\351\204\161\355
\361\016\344\270\030\023\314\126\066\135\321\232\036\121\153\071
\156\140\166\210\064\013\363\263\321\260\235\312\141\342\144\035
\301\106\007\270\143\335\036\063\145\263\216\011\125\122\075\265
\275\377\007\353\255\141\125\030\054\251\151\230\112\252\100\305
\063\024\145\164\000\371\221\336\257\003\110\305\100\124\334\017
\204\220\150\040\305\222\226\334\056\345\002\105\252\300\137\124

```
\370\155\352\111\317\135\154\113\257\357\232\302\126\134\306\065
\126\102\152\060\137\302\253\366\342\075\077\263\311\021\217\061
\114\327\237\111\002\003\001\000\001\243\102\060\100\060\035\006
\003\125\035\016\004\026\004\024\065\112\365\115\257\077\327\202
\070\254\253\161\145\027\165\214\235\125\223\346\060\016\006\003
\125\035\017\001\001\377\004\004\003\002\001\006\060\017\006\003
\125\035\023\001\001\377\004\005\060\003\001\001\377\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001
\000\250\207\351\354\370\100\147\135\303\301\146\307\100\113\227
\374\207\023\220\132\304\357\240\312\137\213\267\247\267\361\326
\265\144\267\212\263\270\033\314\332\373\254\146\210\101\316\350
\374\344\333\036\210\246\355\047\120\033\002\060\044\106\171\376
\004\207\160\227\100\163\321\300\301\127\031\232\151\245\047\231
\253\235\142\204\366\121\301\054\311\043\025\330\050\267\253\045
\023\265\106\341\206\002\377\046\214\304\210\222\035\126\376\031
\147\362\125\344\200\243\153\234\253\167\341\121\161\015\040\333
\020\232\333\275\166\171\007\167\231\050\255\232\136\332\261\117
\104\054\065\216\245\226\307\375\203\360\130\306\171\326\230\174
\250\215\376\206\076\007\026\222\341\173\347\035\354\063\166\176
\102\056\112\205\371\221\211\150\204\003\201\245\233\232\276\343
\067\305\124\253\126\073\030\055\101\244\014\370\102\333\231\240
\340\162\157\273\135\341\026\117\123\012\144\371\116\364\277\116
\124\275\170\154\210\352\277\234\023\044\302\160\151\242\177\017
\310\074\255\010\311\260\230\100\243\052\347\210\203\355\167\217
\164
END
```

#

Trust for Certificate "Security Communication EV RootCA1"

CKA_CLASS

CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Security Communication EV RootCA1"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\376\270\304\062\334\371\166\232\316\256\075\330\220\217\375\050
\206\145\144\175
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\042\055\246\001\352\174\012\367\360\154\126\103\077\167\166\323
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\140\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\045\060\043\006\003\125\004\012\023\034\123\105\103\117\115\040
\124\162\165\163\164\040\123\171\163\164\145\155\163\040\103\117
\056\054\114\124\104\056\061\052\060\050\006\003\125\004\013\023
\041\123\145\143\165\162\151\164\171\040\103\157\155\155\165\156
```

```

\151\143\141\164\151\157\156\040\105\126\040\122\157\157\164\103
\101\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\000
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING
CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "OISTE WISeKey Global Root GA CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "OISTE WISeKey Global Root GA CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\212\061\013\060\011\006\003\125\004\006\023\002\103\110
\061\020\060\016\006\003\125\004\012\023\007\127\111\123\145\113
\145\171\061\033\060\031\006\003\125\004\013\023\022\103\157\160
\171\162\151\147\150\164\040\050\143\051\040\062\060\060\065\061
\042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040
\106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162
\163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111
\123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142
\141\154\040\122\157\157\164\040\107\101\040\103\101
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\212\061\013\060\011\006\003\125\004\006\023\002\103\110
\061\020\060\016\006\003\125\004\012\023\007\127\111\123\145\113
\145\171\061\033\060\031\006\003\125\004\013\023\022\103\157\160
\171\162\151\147\150\164\040\050\143\051\040\062\060\060\065\061
\042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040
\106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162
\163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111
\123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142
\141\154\040\122\157\157\164\040\107\101\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\101\075\162\307\364\153\037\201\103\175\361\322\050\124
\337\232

```


END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\361\060\202\002\331\240\003\002\001\002\002\020\101
\075\162\307\364\153\037\201\103\175\361\322\050\124\337\232\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\212\061\013\060\011\006\003\125\004\006\023\002\103\110\061\020
\060\016\006\003\125\004\012\023\007\127\111\123\145\113\145\171
\061\033\060\031\006\003\125\004\013\023\022\103\157\160\171\162
\151\147\150\164\040\050\143\051\040\062\060\060\065\061\042\060
\040\006\003\125\004\013\023\031\117\111\123\124\105\040\106\157
\165\156\144\141\164\151\157\156\040\105\156\144\157\162\163\145
\144\061\050\060\046\006\003\125\004\003\023\037\117\111\123\124
\105\040\127\111\123\145\113\145\171\040\107\154\157\142\141\154
\040\122\157\157\164\040\107\101\040\103\101\060\036\027\015\060
\065\061\062\061\061\061\066\060\063\064\064\132\027\015\063\067
\061\062\061\061\061\066\060\071\065\061\132\060\201\212\061\013
\060\011\006\003\125\004\006\023\002\103\110\061\020\060\016\006
\003\125\004\012\023\007\127\111\123\145\113\145\171\061\033\060
\031\006\003\125\004\013\023\022\103\157\160\171\162\151\147\150
\164\040\050\143\051\040\062\060\060\065\061\042\060\040\006\003
\125\004\013\023\031\117\111\123\124\105\040\106\157\165\156\144
\141\164\151\157\156\040\105\156\144\157\162\163\145\144\061\050
\060\046\006\003\125\004\003\023\037\117\111\123\124\105\040\127
\111\123\145\113\145\171\040\107\154\157\142\141\154\040\122\157
\157\164\040\107\101\040\103\101\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\313\117\263\000\233\075\066
\335\371\321\111\152\153\020\111\037\354\330\053\262\306\370\062
\201\051\103\225\114\232\031\043\041\025\105\336\343\310\034\121
\125\133\256\223\350\067\377\053\153\351\324\352\276\052\335\250
\121\053\327\146\303\141\134\140\002\310\365\316\162\173\073\270
\362\116\145\010\232\315\244\152\031\301\001\273\163\246\327\366
\303\335\315\274\244\213\265\231\141\270\001\242\243\324\115\324
\005\075\221\255\370\264\010\161\144\257\160\361\034\153\176\366
\303\167\235\044\163\173\344\014\214\341\331\066\341\231\213\005
\231\013\355\105\061\011\312\302\000\333\367\162\240\226\252\225
\207\320\216\307\266\141\163\015\166\146\214\334\033\264\143\242
\237\177\223\023\060\361\241\047\333\331\377\054\125\210\221\240
\340\117\007\260\050\126\214\030\033\227\104\216\211\335\340\027
\156\347\052\357\217\071\012\061\204\202\330\100\024\111\056\172
\101\344\247\376\343\144\314\301\131\161\113\054\041\247\133\175
\340\035\321\056\201\233\303\330\150\367\275\226\033\254\160\261
\026\024\013\333\140\271\046\001\005\002\003\001\000\001\243\121
\060\117\060\013\006\003\125\035\017\004\004\003\002\001\206\060
\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377
\060\035\006\003\125\035\016\004\026\004\024\263\003\176\256\066
\274\260\171\321\334\224\046\266\021\276\041\262\151\206\224\060
\020\006\011\053\006\001\004\001\202\067\025\001\004\003\002\001

```
\000\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\202\001\001\000\113\241\377\013\207\156\263\371\301\103\261
\110\363\050\300\035\056\311\011\101\372\224\000\034\244\244\253
\111\117\217\075\036\357\115\157\275\274\244\366\362\046\060\311
\020\312\035\210\373\164\031\037\205\105\275\260\154\121\371\066
\176\333\365\114\062\072\101\117\133\107\317\350\013\055\266\304
\031\235\164\305\107\306\073\152\017\254\024\333\074\364\163\234
\251\005\337\000\334\164\170\372\370\065\140\131\002\023\030\174
\274\373\115\260\040\155\103\273\140\060\172\147\063\134\305\231
\321\370\055\071\122\163\373\214\252\227\045\134\162\331\010\036
\253\116\074\343\201\061\237\003\246\373\300\376\051\210\125\332
\204\325\120\003\266\342\204\243\246\066\252\021\072\001\341\030
\113\326\104\150\263\075\371\123\164\204\263\106\221\106\226\000
\267\200\054\266\341\343\020\342\333\242\347\050\217\001\226\142
\026\076\000\343\034\245\066\201\030\242\114\122\166\300\021\243
\156\346\035\272\343\132\276\066\123\305\076\165\217\206\151\051
\130\123\265\234\273\157\237\134\305\030\354\335\057\341\230\311
\374\276\337\012\015
```

END

#

```
Trust for Certificate "OISTE WISeKey Global Root GA CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "OISTE WISeKey Global Root GA CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\131\042\241\341\132\352\026\065\041\370\230\071\152\106\106\260
\104\033\017\251
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\274\154\121\063\247\351\323\146\143\124\025\162\033\041\222\223
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\212\061\013\060\011\006\003\125\004\006\023\002\103\110
\061\020\060\016\006\003\125\004\012\023\007\127\111\123\145\113
\145\171\061\033\060\031\006\003\125\004\013\023\022\103\157\160
\171\162\151\147\150\164\040\050\143\051\040\062\060\060\065\061
\042\060\040\006\003\125\004\013\023\031\117\111\123\124\105\040
\106\157\165\156\144\141\164\151\157\156\040\105\156\144\157\162
\163\145\144\061\050\060\046\006\003\125\004\003\023\037\117\111
\123\124\105\040\127\111\123\145\113\145\171\040\107\154\157\142
\141\154\040\122\157\157\164\040\107\101\040\103\101
```

END

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\101\075\162\307\364\153\037\201\103\175\361\322\050\124
```

```

\337\232
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "S-TRUST Authentication and Encryption Root CA 2005 PN"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "S-TRUST Authentication and Encryption Root CA 2005 PN"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\256\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\040\060\036\006\003\125\004\010\023\027\102\141\144\145\156
\055\127\165\145\162\164\164\145\155\142\145\162\147\040\050\102
\127\051\061\022\060\020\006\003\125\004\007\023\011\123\164\165
\164\164\147\141\162\164\061\051\060\047\006\003\125\004\012\023
\040\104\145\165\164\163\143\150\145\162\040\123\160\141\162\153
\141\163\163\145\156\040\126\145\162\154\141\147\040\107\155\142
\110\061\076\060\074\006\003\125\004\003\023\065\123\055\124\122
\125\123\124\040\101\165\164\150\145\156\164\151\143\141\164\151
\157\156\040\141\156\144\040\105\156\143\162\171\160\164\151\157
\156\040\122\157\157\164\040\103\101\040\062\060\060\065\072\120
\116
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\256\061\013\060\011\006\003\125\004\006\023\002\104\105
\061\040\060\036\006\003\125\004\010\023\027\102\141\144\145\156
\055\127\165\145\162\164\164\145\155\142\145\162\147\040\050\102
\127\051\061\022\060\020\006\003\125\004\007\023\011\123\164\165
\164\164\147\141\162\164\061\051\060\047\006\003\125\004\012\023
\040\104\145\165\164\163\143\150\145\162\040\123\160\141\162\153
\141\163\163\145\156\040\126\145\162\154\141\147\040\107\155\142
\110\061\076\060\074\006\003\125\004\003\023\065\123\055\124\122
\125\123\124\040\101\165\164\150\145\156\164\151\143\141\164\151
\157\156\040\141\156\144\040\105\156\143\162\171\160\164\151\157
\156\040\122\157\157\164\040\103\101\040\062\060\060\065\072\120
\116
END
CKA_SERIAL_NUMBER

```

MULTILINE_OCTAL

\002\020\067\031\030\346\123\124\174\032\265\270\313\131\132\333
\065\267

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\173\060\202\003\143\240\003\002\001\002\002\020\067
\031\030\346\123\124\174\032\265\270\313\131\132\333\065\267\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\201
\256\061\013\060\011\006\003\125\004\006\023\002\104\105\061\040
\060\036\006\003\125\004\010\023\027\102\141\144\145\156\055\127
\165\145\162\164\164\145\155\142\145\162\147\040\050\102\127\051
\061\022\060\020\006\003\125\004\007\023\011\123\164\165\164\164
\147\141\162\164\061\051\060\047\006\003\125\004\012\023\040\104
\145\165\164\163\143\150\145\162\040\123\160\141\162\153\141\163
\163\145\156\040\126\145\162\154\141\147\040\107\155\142\110\061
\076\060\074\006\003\125\004\003\023\065\123\055\124\122\125\123
\124\040\101\165\164\150\145\156\164\151\143\141\164\151\157\156
\040\141\156\144\040\105\156\143\162\171\160\164\151\157\156\040
\122\157\157\164\040\103\101\040\062\060\060\065\072\120\116\060
\036\027\015\060\065\060\066\062\062\060\060\060\060\060\132
\027\015\063\060\060\066\062\061\062\063\065\071\065\071\132\060
\201\256\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\040\060\036\006\003\125\004\010\023\027\102\141\144\145\156\055
\127\165\145\162\164\164\145\155\142\145\162\147\040\050\102\127
\051\061\022\060\020\006\003\125\004\007\023\011\123\164\165\164
\164\147\141\162\164\061\051\060\047\006\003\125\004\012\023\040
\104\145\165\164\163\143\150\145\162\040\123\160\141\162\153\141
\163\163\145\156\040\126\145\162\154\141\147\040\107\155\142\110
\061\076\060\074\006\003\125\004\003\023\065\123\055\124\122\125
\123\124\040\101\165\164\150\145\156\164\151\143\141\164\151\157
\156\040\141\156\144\040\105\156\143\162\171\160\164\151\157\156
\040\122\157\157\164\040\103\101\040\062\060\060\065\072\120\116
\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001
\000\331\265\112\301\323\063\352\323\106\263\321\342\114\322\365
\266\203\320\157\325\030\351\223\257\047\216\023\315\265\045\066
\120\064\022\144\051\241\125\341\072\140\223\236\050\311\343\363
\233\341\004\260\043\277\225\212\216\133\033\101\177\132\303\350
\115\114\325\044\026\076\207\110\324\047\256\346\367\123\035\273
\014\000\357\076\141\161\255\277\072\172\130\037\224\075\134\201
\325\325\157\337\270\233\322\365\345\313\203\162\222\302\123\262
\202\002\353\255\255\137\026\055\222\123\166\361\211\266\054\365
\301\057\340\247\112\157\240\060\152\062\353\232\164\003\150\170
\023\235\312\057\233\013\035\276\317\165\015\046\227\233\307\365
\136\012\237\170\337\263\274\354\232\272\357\125\217\033\232\246
\007\143\051\027\131\142\011\052\171\007\167\245\340\321\027\151
\351\133\335\366\220\253\342\230\012\000\321\045\155\236\327\205
\207\057\222\361\321\166\203\117\013\072\131\067\050\057\063\247

\027\120\326\040\013\012\364\046\371\237\070\347\055\244\270\233
\211\215\255\255\311\152\175\211\027\273\366\177\200\203\172\346
\355\002\003\001\000\001\243\201\222\060\201\217\060\022\006\003
\125\035\023\001\001\377\004\010\060\006\001\001\377\002\001\000
\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006
\060\051\006\003\125\035\021\004\042\060\040\244\036\060\034\061
\032\060\030\006\003\125\004\003\023\021\123\124\122\157\156\154
\151\156\145\061\055\062\060\064\070\055\065\060\035\006\003\125
\035\016\004\026\004\024\017\312\036\134\171\340\242\363\051\266
\322\205\263\013\112\265\145\354\153\122\060\037\006\003\125\035
\043\004\030\060\026\200\024\017\312\036\134\171\340\242\363\051
\266\322\205\263\013\112\265\145\354\153\122\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000\257
\001\360\355\031\074\050\350\115\134\273\245\143\034\210\063\003
\247\000\207\244\037\040\253\326\034\343\006\037\227\176\124\275
\267\321\262\311\325\332\200\354\027\327\212\365\173\302\000\366
\351\021\157\204\240\132\045\061\342\211\371\244\000\077\061\150
\056\325\075\350\156\346\325\035\074\077\262\275\237\167\353\235
\323\214\272\300\327\266\115\354\123\234\017\004\156\352\065\147
\127\343\012\145\173\220\072\341\117\076\303\000\222\172\273\005
\211\163\214\313\246\115\300\373\366\002\326\260\007\243\003\302
\047\100\237\014\344\205\202\055\257\232\102\035\320\307\215\370
\100\356\235\006\127\034\331\242\330\200\024\376\341\143\055\062
\207\325\224\122\226\072\106\306\161\226\075\367\230\016\262\221
\252\217\332\364\116\044\000\071\125\350\255\027\271\323\064\053
\112\251\100\314\027\052\125\145\101\164\102\176\365\300\257\310
\223\255\362\030\133\075\211\014\333\107\071\044\370\340\114\362
\037\260\075\012\312\005\116\211\041\032\343\052\231\254\374\177
\241\361\017\033\037\075\236\004\203\335\226\331\035\072\224

END

#

Trust for Certificate "S-TRUST
Authentication and Encryption Root CA 2005 PN"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "S-TRUST Authentication and Encryption Root CA 2005 PN"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\276\265\251\225\164\153\236\337\163\213\126\346\337\103\172\167
\276\020\153\201
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\004\113\375\311\154\332\052\062\205\174\131\204\141\106\212\144
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\256\061\013\060\011\006\003\125\004\006\023\002\104\105

```
\061\040\060\036\006\003\125\004\010\023\027\102\141\144\145\156
\055\127\165\145\162\164\164\145\155\142\145\162\147\040\050\102
\127\051\061\022\060\020\006\003\125\004\007\023\011\123\164\165
\164\164\147\141\162\164\061\051\060\047\006\003\125\004\012\023
\040\104\145\165\164\163\143\150\145\162\040\123\160\141\162\153
\141\163\163\145\156\040\126\145\162\154\141\147\040\107\155\142
\110\061\076\060\074\006\003\125\004\003\023\065\123\055\124\122
\125\123\124\040\101\165\164\150\145\156\164\151\143\141\164\151
\157\156\040\141\156\144\040\105\156\143\162\171\160\164\151\157
\156\040\122\157\157\164\040\103\101\040\062\060\060\065\072\120
\116
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\020\067\031\030\346\123\124\174\032\265\270\313\131\132\333
\065\267
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Microsec e-Szigno Root CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Microsec e-Szigno Root CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\162\061\013\060\011\006\003\125\004\006\023\002\110\125\061
\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160\145
\163\164\061\026\060\024\006\003\125\004\012\023\015\115\151\143
\162\157\163\145\143\040\114\164\144\056\061\024\060\022\006\003
\125\004\013\023\013\145\055\123\172\151\147\156\157\040\103\101
\061\042\060\040\006\003\125\004\003\023\031\115\151\143\162\157
\163\145\143\040\145\055\123\172\151\147\156\157\040\122\157\157
\164\040\103\101
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\162\061\013\060\011\006\003\125\004\006\023\002\110\125\061
\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160\145
\163\164\061\026\060\024\006\003\125\004\012\023\015\115\151\143
\162\157\163\145\143\040\114\164\144\056\061\024\060\022\006\003
```

\125\004\013\023\013\145\055\123\172\151\147\156\157\040\103\101
\061\042\060\040\006\003\125\004\003\023\031\115\151\143\162\157
\163\145\143\040\145\055\123\172\151\147\156\157\040\122\157\157
\164\040\103\101

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\021\000\314\270\347\277\116\051\032\375\242\334\146\245\034
\054\017\021

END

CKA_VALUE MULTILINE_OCTAL

\060\202\007\250\060\202\006\220\240\003\002\001\002\002\021\000
\314\270\347\277\116\051\032\375\242\334\146\245\034\054\017\021
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\162\061\013\060\011\006\003\125\004\006\023\002\110\125\061\021
\060\017\006\003\125\004\007\023\010\102\165\144\141\160\145\163
\164\061\026\060\024\006\003\125\004\012\023\015\115\151\143\162
\157\163\145\143\040\114\164\144\056\061\024\060\022\006\003\125
\004\013\023\013\145\055\123\172\151\147\156\157\040\103\101\061
\042\060\040\006\003\125\004\003\023\031\115\151\143\162\157\163
\145\143\040\145\055\123\172\151\147\156\157\040\122\157\157\164
\040\103\101\060\036\027\015\060\065\060\064\060\066\061\062\062
\070\064\064\132\027\015\061\067\060\064\060\066\061\062\062\070
\064\064\132\060\162\061\013\060\011\006\003\125\004\006\023\002
\110\125\061\021\060\017\006\003\125\004\007\023\010\102\165\144
\141\160\145\163\164\061\026\060\024\006\003\125\004\012\023\015
\115\151\143\162\157\163\145\143\040\114\164\144\056\061\024\060
\022\006\003\125\004\013\023\013\145\055\123\172\151\147\156\157
\040\103\101\061\042\060\040\006\003\125\004\003\023\031\115\151
\143\162\157\163\145\143\040\145\055\123\172\151\147\156\157\040
\122\157\157\164\040\103\101\060\202\001\042\060\015\006\011\052
\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060
\202\001\012\002\202\001\001\000\355\310\000\325\201\173\315\070
\000\107\314\333\204\301\041\151\054\164\220\014\041\331\123\207
\355\076\103\104\123\257\253\370\200\233\074\170\215\324\215\256
\270\357\323\021\334\201\346\317\073\226\214\326\157\025\306\167
\176\241\057\340\137\222\266\047\327\166\232\035\103\074\352\331
\354\057\356\071\363\152\147\113\213\202\317\042\370\145\125\376
\054\313\057\175\110\172\075\165\371\252\240\047\273\170\302\006
\312\121\302\176\146\113\257\315\242\247\115\002\202\077\202\254
\205\306\341\017\220\107\231\224\012\161\162\223\052\311\246\300
\276\074\126\114\163\222\047\361\153\265\365\375\374\060\005\140
\222\306\353\226\176\001\221\302\151\261\036\035\173\123\105\270
\334\101\037\311\213\161\326\124\024\343\213\124\170\077\276\364
\142\073\133\365\243\354\325\222\164\342\164\060\357\001\333\341
\324\253\231\233\052\153\370\275\246\034\206\043\102\137\354\111
\336\232\213\133\364\162\072\100\305\111\076\245\276\216\252\161
\353\154\372\365\032\344\152\375\173\175\125\100\357\130\156\346
\331\325\274\044\253\301\357\267\002\003\001\000\001\243\202\004

\067\060\202\004\063\060\147\006\010\053\006\001\005\005\007\001
\001\004\133\060\131\060\050\006\010\053\006\001\005\005\007\060
\001\206\034\150\164\164\160\163\072\057\057\162\143\141\056\145
\055\163\172\151\147\156\157\056\150\165\057\157\143\163\160\060
\055\006\010\053\006\001\005\005\007\060\002\206\041\150\164\164
\160\072\057\057\167\167\167\056\145\055\163\172\151\147\156\157
\056\150\165\057\122\157\157\164\103\101\056\143\162\164\060\017
\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060
\202\001\163\006\003\125\035\040\004\202\001\152\060\202\001\146
\060\202\001\142\006\014\053\006\001\004\001\201\250\030\002\001
\001\001\060\202\001\120\060\050\006\010\053\006\001\005\005\007
\002\001\026\034\150\164\164\160\072\057\057\167\167\167\056\145
\055\163\172\151\147\156\157\056\150\165\057\123\132\123\132\057
\060\202\001\042\006\010\053\006\001\005\005\007\002\002\060\202
\001\024\036\202\001\020\000\101\000\040\000\164\000\141\000\156
\000\372\000\163\000\355\000\164\000\166\000\341\000\156\000\171
\000\040\000\351\000\162\000\164\000\145\000\154\000\155\000\145
\000\172\000\351\000\163\000\351\000\150\000\145\000\172\000\040
\000\351\000\163\000\040\000\145\000\154\000\146\000\157\000\147
\000\141\000\144\000\341\000\163\000\341\000\150\000\157\000\172
\000\040\000\141\000\040\000\123\000\172\000\157\000\154\000\147
\000\341\000\154\000\164\000\141\000\164\000\363\000\040\000\123
\000\172\000\157\000\154\000\147\000\341\000\154\000\164\000\141
\000\164\000\341\000\163\000\151\000\040\000\123\000\172\000\141
\000\142\000\341\000\154\000\171\000\172\000\141\000\164\000\141
\000\040\000\163\000\172\000\145\000\162\000\151\000\156\000\164
\000\040\000\153\000\145\000\154\000\154\000\040\000\145\000\154
\000\152\000\341\000\162\000\156\000\151\000\072\000\040\000\150
\000\164\000\164\000\160\000\072\000\057\000\057\000\167\000\167
\000\167\000\056\000\145\000\055\000\163\000\172\000\151\000\147
\000\156\000\157\000\056\000\150\000\165\000\057\000\123\000\132
\000\123\000\132\000\057\060\201\310\006\003\125\035\037\004\201
\300\060\201\275\060\201\272\240\201\267\240\201\264\206\041\150
\164\164\160\072\057\057\167\167\167\056\145\055\163\172\151\147
\156\157\056\150\165\057\122\157\157\164\103\101\056\143\162\154
\206\201\216\154\144\141\160\072\057\057\154\144\141\160\056\145
\055\163\172\151\147\156\157\056\150\165\057\103\116\075\115\151
\143\162\157\163\145\143\045\062\060\145\055\123\172\151\147\156
\157\045\062\060\122\157\157\164\045\062\060\103\101\054\117\125
\075\145\055\123\172\151\147\156\157\045\062\060\103\101\054\117
\075\115\151\143\162\157\163\145\143\045\062\060\114\164\144\056
\054\114\075\102\165\144\141\160\145\163\164\054\103\075\110\125
\077\143\145\162\164\151\146\151\143\141\164\145\122\145\166\157
\143\141\164\151\157\156\114\151\163\164\073\142\151\156\141\162
\171\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001
\006\060\201\226\006\003\125\035\021\004\201\216\060\201\213\201
\020\151\156\146\157\100\145\055\163\172\151\147\156\157\056\150
\165\244\167\060\165\061\043\060\041\006\003\125\004\003\014\032

\115\151\143\162\157\163\145\143\040\145\055\123\172\151\147\156
\303\263\040\122\157\157\164\040\103\101\061\026\060\024\006\003
\125\004\013\014\015\145\055\123\172\151\147\156\303\263\040\110
\123\132\061\026\060\024\006\003\125\004\012\023\015\115\151\143
\162\157\163\145\143\040\113\146\164\056\061\021\060\017\006\003
\125\004\007\023\010\102\165\144\141\160\145\163\164\061\013\060
\011\006\003\125\004\006\023\002\110\125\060\201\254\006\003\125
\035\043\004\201\244\060\201\241\200\024\307\240\111\165\026\141
\204\333\061\113\204\322\361\067\100\220\357\116\334\367\241\166
\244\164\060\162\061\013\060\011\006\003\125\004\006\023\002\110
\125\061\021\060\017\006\003\125\004\007\023\010\102\165\144\141
\160\145\163\164\061\026\060\024\006\003\125\004\012\023\015\115
\151\143\162\157\163\145\143\040\114\164\144\056\061\024\060\022
\006\003\125\004\013\023\013\145\055\123\172\151\147\156\157\040
\103\101\061\042\060\040\006\003\125\004\003\023\031\115\151\143
\162\157\163\145\143\040\145\055\123\172\151\147\156\157\040\122
\157\157\164\040\103\101\202\021\000\314\270\347\277\116\051\032
\375\242\334\146\245\034\054\017\021\060\035\006\003\125\035\016
\004\026\004\024\307\240\111\165\026\141\204\333\061\113\204\322
\361\067\100\220\357\116\334\367\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\202\001\001\000\323\023\234\146
\143\131\056\312\134\160\014\374\203\274\125\261\364\216\007\154
\146\047\316\301\073\040\251\034\273\106\124\160\356\132\314\240
\167\352\150\104\047\353\362\051\335\167\251\325\373\343\324\247
\004\304\225\270\013\341\104\150\140\007\103\060\061\102\141\345
\356\331\345\044\325\033\337\341\112\033\252\237\307\137\370\172
\021\352\023\223\000\312\212\130\261\356\355\016\115\264\327\250
\066\046\174\340\072\301\325\127\202\361\165\266\375\211\137\332
\363\250\070\237\065\006\010\316\042\225\276\315\325\374\276\133
\336\171\153\334\172\251\145\146\276\261\045\132\137\355\176\323
\254\106\155\114\364\062\207\264\040\004\340\154\170\260\167\321
\205\106\113\246\022\267\165\350\112\311\126\154\327\222\253\235
\365\111\070\322\117\123\343\125\220\021\333\230\226\306\111\362
\076\364\237\033\340\367\210\334\045\142\231\104\330\163\277\077
\060\363\014\067\076\324\302\050\200\163\261\001\267\235\132\226
\024\001\113\251\021\235\051\152\056\320\135\201\300\317\262\040
\103\307\003\340\067\116\135\012\334\131\040\045

END

#

Trust

for Certificate "Microsec e-Szigno Root CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Microsec e-Szigno Root CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\043\210\311\323\161\314\236\226\075\377\175\074\247\316\374\326
\045\354\031\015

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\360\226\266\057\305\020\325\147\216\203\045\062\350\136\056\345
END

CKA_ISSUER MULTILINE_OCTAL

\060\162\061\013\060\011\006\003\125\004\006\023\002\110\125\061
\021\060\017\006\003\125\004\007\023\010\102\165\144\141\160\145
\163\164\061\026\060\024\006\003\125\004\012\023\015\115\151\143
\162\157\163\145\143\040\114\164\144\056\061\024\060\022\006\003
\125\004\013\023\013\145\055\123\172\151\147\156\157\040\103\101
\061\042\060\040\006\003\125\004\003\023\031\115\151\143\162\157
\163\145\143\040\145\055\123\172\151\147\156\157\040\122\157\157
\164\040\103\101

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\021\000\314\270\347\277\116\051\032\375\242\334\146\245\034
\054\017\021

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Certigna"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Certigna"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\064\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\022\060\020\006\003\125\004\012\014\011\104\150\151\155\171\157
\164\151\163\061\021\060\017\006\003\125\004\003\014\010\103\145
\162\164\151\147\156\141

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\064\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\022\060\020\006\003\125\004\012\014\011\104\150\151\155\171\157
\164\151\163\061\021\060\017\006\003\125\004\003\014\010\103\145
\162\164\151\147\156\141

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\011\000\376\334\343\001\017\311\110\377

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\250\060\202\002\220\240\003\002\001\002\002\011\000
\376\334\343\001\017\311\110\377\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\060\064\061\013\060\011\006\003\125
\004\006\023\002\106\122\061\022\060\020\006\003\125\004\012\014
\011\104\150\151\155\171\157\164\151\163\061\021\060\017\006\003
\125\004\003\014\010\103\145\162\164\151\147\156\141\060\036\027
\015\060\067\060\066\062\071\061\065\061\063\060\065\132\027\015
\062\067\060\066\062\071\061\065\061\063\060\065\132\060\064\061
\013\060\011\006\003\125\004\006\023\002\106\122\061\022\060\020
\006\003\125\004\012\014\011\104\150\151\155\171\157\164\151\163
\061\021\060\017\006\003\125\004\003\014\010\103\145\162\164\151
\147\156\141\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002
\202\001\001\000\310\150\361\311\326\326\263\064\165\046\202\036
\354\264\276\352\134\341\046\355\021\107\141\341\242\174\026\170
\100\041\344\140\236\132\310\143\341\304\261\226\222\377\030\155
\151\043\341\053\142\367\335\342\066\057\221\007\271\110\317\016
\354\171\266\054\347\064\113\160\010\045\243\074\207\033\031\362
\201\007\017\070\220\031\323\021\376\206\264\362\321\136\036\036
\226\315\200\154\316\073\061\223\266\362\240\320\251\225\022\175
\245\232\314\153\310\204\126\212\063\251\347\042\025\123\026\360
\314\027\354\127\137\351\242\012\230\011\336\343\137\234\157\334
\110\343\205\013\025\132\246\272\237\254\110\343\011\262\367\364
\062\336\136\064\276\034\170\135\102\133\316\016\042\217\115\220
\327\175\062\030\263\013\054\152\277\216\077\024\021\211\040\016
\167\024\265\075\224\010\207\367\045\036\325\262\140\000\354\157
\052\050\045\156\052\076\030\143\027\045\077\076\104\040\026\366
\046\310\045\256\005\112\264\347\143\054\363\214\026\123\176\134
\373\021\032\010\301\106\142\237\042\270\361\302\215\151\334\372
\072\130\006\337\002\003\001\000\001\243\201\274\060\201\271\060
\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377
\060\035\006\003\125\035\016\004\026\004\024\032\355\376\101\071
\220\264\044\131\276\001\362\122\325\105\366\132\071\334\021\060
\144\006\003\125\035\043\004\135\060\133\200\024\032\355\376\101
\071\220\264\044\131\276\001\362\122\325\105\366\132\071\334\021
\241\070\244\066\060\064\061\013\060\011\006\003\125\004\006\023
\002\106\122\061\022\060\020\006\003\125\004\012\014\011\104\150
\151\155\171\157\164\151\163\061\021\060\017\006\003\125\004\003
\014\010\103\145\162\164\151\147\156\141\202\011\000\376\334\343
\001\017\311\110\377\060\016\006\003\125\035\017\001\001\377\004
\004\003\002\001\006\060\021\006\011\140\206\110\001\206\370\102
\001\001\004\004\003\002\000\007\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\202\001\001\000\205\003\036\222

```
\161\366\102\257\341\243\141\236\353\363\300\017\362\245\324\332
\225\346\326\276\150\066\075\176\156\037\114\212\357\321\017\041
\155\136\245\122\143\316\022\370\357\052\332\157\353\067\376\023
\002\307\313\073\076\042\153\332\141\056\177\324\162\075\335\060
\341\036\114\100\031\214\017\327\234\321\203\060\173\230\131\334
\175\306\271\014\051\114\241\063\242\353\147\072\145\204\323\226
\342\355\166\105\160\217\265\053\336\371\043\326\111\156\074\024
\265\306\237\065\036\120\320\301\217\152\160\104\002\142\313\256
\035\150\101\247\252\127\350\123\252\007\322\006\366\325\024\006
\013\221\003\165\054\154\162\265\141\225\232\015\213\271\015\347
\365\337\124\315\336\346\330\326\011\010\227\143\345\301\056\260
\267\104\046\300\046\300\257\125\060\236\073\325\066\052\031\004
\364\134\036\377\317\054\267\377\320\375\207\100\021\325\021\043
\273\110\300\041\251\244\050\055\375\025\370\260\116\053\364\060
\133\041\374\021\221\064\276\101\357\173\235\227\165\377\227\225
\300\226\130\057\352\273\106\327\273\344\331\056
```

END

#

Trust

for Certificate "Certigna"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Certigna"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\261\056\023\143\105\206\244\157\032\262\140\150\067\130\055\304
\254\375\224\227
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\253\127\246\133\175\102\202\031\265\330\130\046\050\136\375\377
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\064\061\013\060\011\006\003\125\004\006\023\002\106\122\061
\022\060\020\006\003\125\004\012\014\011\104\150\151\155\171\157
\164\151\163\061\021\060\017\006\003\125\004\003\014\010\103\145
\162\164\151\147\156\141
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\011\000\376\334\343\001\017\311\110\377
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

```

# Certificate "AC
Raiz Certicamara S.A."
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AC Ra\xC3\xADz Certic\xC3\xA1mara S.A."
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\173\061\013\060\011\006\003\125\004\006\023\002\103\117\061
\107\060\105\006\003\125\004\012\014\076\123\157\143\151\145\144
\141\144\040\103\141\155\145\162\141\154\040\144\145\040\103\145
\162\164\151\146\151\143\141\143\151\303\263\156\040\104\151\147
\151\164\141\154\040\055\040\103\145\162\164\151\143\303\241\155
\141\162\141\040\123\056\101\056\061\043\060\041\006\003\125\004
\003\014\032\101\103\040\122\141\303\255\172\040\103\145\162\164
\151\143\303\241\155\141\162\141\040\123\056\101\056
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\173\061\013\060\011\006\003\125\004\006\023\002\103\117\061
\107\060\105\006\003\125\004\012\014\076\123\157\143\151\145\144
\141\144\040\103\141\155\145\162\141\154\040\144\145\040\103\145
\162\164\151\146\151\143\141\143\151\303\263\156\040\104\151\147
\151\164\141\154\040\055\040\103\145\162\164\151\143\303\241\155
\141\162\141\040\123\056\101\056\061\043\060\041\006\003\125\004
\003\014\032\101\103\040\122\141\303\255\172\040\103\145\162\164
\151\143\303\241\155\141\162\141\040\123\056\101\056
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\017\007\176\122\223\173\340\025\343\127\360\151\214\313\354
\014
END
CKA_VALUE MULTILINE_OCTAL
\060\202\006\146\060\202\004\116\240\003\002\001\002\002\017\007
\176\122\223\173\340\025\343\127\360\151\214\313\354\014\060\015
\006\011\052\206\110\206\367\015\001\001\005\005\000\060\173\061
\013\060\011\006\003\125\004\006\023\002\103\117\061\107\060\105
\006\003\125\004\012\014\076\123\157\143\151\145\144\141\144\040
\103\141\155\145\162\141\154\040\144\145\040\103\145\162\164\151
\146\151\143\141\143\151\303\263\156\040\104\151\147\151\164\141
\154\040\055\040\103\145\162\164\151\143\303\241\155\141\162\141
\040\123\056\101\056\061\043\060\041\006\003\125\004\003\014\032
\101\103\040\122\141\303\255\172\040\103\145\162\164\151\143\303
\241\155\141\162\141\040\123\056\101\056\060\036\027\015\060\066
\061\061\062\067\062\060\064\066\062\071\132\027\015\063\060\060

```

\064\060\062\062\061\064\062\060\062\132\060\173\061\013\060\011
\006\003\125\004\006\023\002\103\117\061\107\060\105\006\003\125
\004\012\014\076\123\157\143\151\145\144\141\144\040\103\141\155
\145\162\141\154\040\144\145\040\103\145\162\164\151\146\151\143
\141\143\151\303\263\156\040\104\151\147\151\164\141\154\040\055
\040\103\145\162\164\151\143\303\241\155\141\162\141\040\123\056
\101\056\061\043\060\041\006\003\125\004\003\014\032\101\103\040
\122\141\303\255\172\040\103\145\162\164\151\143\303\241\155\141
\162\141\040\123\056\101\056\060\202\002\042\060\015\006\011\052
\206\110\206\367\015\001\001\001\005\000\003\202\002\017\000\060
\202\002\012\002\202\002\001\000\253\153\211\243\123\314\110\043
\010\373\303\317\121\226\010\056\270\010\172\155\074\220\027\206
\251\351\355\056\023\064\107\262\320\160\334\311\074\320\215\312
\356\113\027\253\320\205\260\247\043\004\313\250\242\374\345\165
\333\100\312\142\211\217\120\236\001\075\046\133\030\204\034\313
\174\067\267\175\354\323\177\163\031\260\152\262\330\210\212\055
\105\164\250\367\263\270\300\324\332\315\042\211\164\115\132\025
\071\163\030\164\117\265\353\231\247\301\036\210\264\302\223\220
\143\227\363\247\247\022\262\011\042\007\063\331\221\315\016\234
\037\016\040\307\356\273\063\215\217\302\322\130\247\137\375\145
\067\342\210\302\330\217\206\165\136\371\055\247\207\063\362\170
\067\057\213\274\035\206\067\071\261\224\362\330\274\112\234\203
\030\132\006\374\363\324\324\272\214\025\011\045\360\371\266\215
\004\176\027\022\063\153\127\110\114\117\333\046\036\353\314\220
\347\213\371\150\174\160\017\243\052\320\072\070\337\067\227\342
\133\336\200\141\323\200\330\221\203\102\132\114\004\211\150\021
\074\254\137\150\200\101\314\140\102\316\015\132\052\014\017\233
\060\300\246\360\206\333\253\111\327\227\155\110\213\371\003\300
\122\147\233\022\367\302\362\056\230\145\102\331\326\232\343\320
\031\061\014\255\207\325\127\002\172\060\350\206\046\373\217\043
\212\124\207\344\277\074\356\353\303\165\110\137\036\071\157\201
\142\154\305\055\304\027\124\031\267\067\215\234\067\221\310\366
\013\325\352\143\157\203\254\070\302\363\077\336\232\373\341\043
\141\360\310\046\313\066\310\241\363\060\217\244\243\242\241\335
\123\263\336\360\232\062\037\203\221\171\060\301\251\037\123\233
\123\242\025\123\077\335\235\263\020\073\110\175\211\017\374\355
\003\365\373\045\144\165\016\027\031\015\217\000\026\147\171\172
\100\374\055\131\007\331\220\372\232\255\075\334\200\212\346\134
\065\242\147\114\021\153\261\370\200\144\000\055\157\042\141\305
\254\113\046\345\132\020\202\233\244\203\173\064\367\236\211\221
\040\227\216\267\102\307\146\303\320\351\244\326\365\040\215\304
\303\225\254\104\012\235\133\163\074\046\075\057\112\276\247\311
\247\020\036\373\237\120\151\363\002\003\001\000\001\243\201\346
\060\201\343\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\006\060\035\006\003\125\035\016\004\026\004\024\321
\011\320\351\327\316\171\164\124\371\072\060\263\364\155\054\003
\003\033\150\060\201\240\006\003\125\035\040\004\201\230\060\201

\225\060\201\222\006\004\125\035\040\000\060\201\211\060\053\006
\010\053\006\001\005\005\007\002\001\026\037\150\164\164\160\072
\057\057\167\167\167\056\143\145\162\164\151\143\141\155\141\162
\141\056\143\157\155\057\144\160\143\057\060\132\006\010\053\006
\001\005\005\007\002\002\060\116\032\114\114\151\155\151\164\141
\143\151\157\156\145\163\040\144\145\040\147\141\162\141\156\164
\355\141\163\040\144\145\040\145\163\164\145\040\143\145\162\164
\151\146\151\143\141\144\157\040\163\145\040\160\165\145\144\145
\156\040\145\156\143\157\156\164\162\141\162\040\145\156\040\154
\141\040\104\120\103\056\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\002\001\000\134\224\265\270\105\221
\115\216\141\037\003\050\017\123\174\346\244\131\251\263\212\172
\305\260\377\010\174\054\243\161\034\041\023\147\241\225\022\100
\065\203\203\217\164\333\063\134\360\111\166\012\201\122\335\111
\324\232\062\063\357\233\247\313\165\345\172\313\227\022\220\134
\272\173\305\233\337\273\071\043\310\377\230\316\012\115\042\001
\110\007\176\212\300\325\040\102\224\104\357\277\167\242\211\147
\110\033\100\003\005\241\211\354\317\142\343\075\045\166\146\277
\046\267\273\042\276\157\377\071\127\164\272\172\311\001\225\301
\225\121\350\253\054\370\261\206\040\351\077\313\065\133\322\027
\351\052\376\203\023\027\100\356\210\142\145\133\325\073\140\351
\173\074\270\311\325\177\066\002\045\252\150\302\061\025\267\060
\145\353\177\035\110\171\261\317\071\342\102\200\026\323\365\223
\043\374\114\227\311\132\067\154\174\042\330\112\315\322\216\066
\203\071\221\220\020\310\361\311\065\176\077\270\323\201\306\040
\144\032\266\120\302\041\244\170\334\320\057\073\144\223\164\360
\226\220\361\357\373\011\132\064\100\226\360\066\022\301\243\164
\214\223\176\101\336\167\213\354\206\331\322\017\077\055\321\314
\100\242\211\146\110\036\040\263\234\043\131\163\251\104\163\274
\044\171\220\126\067\263\306\051\176\243\017\361\051\071\357\176
\134\050\062\160\065\254\332\270\310\165\146\374\233\114\071\107
\216\033\157\233\115\002\124\042\063\357\141\272\236\051\204\357
\116\113\063\107\166\227\152\313\176\137\375\025\246\236\102\103
\133\146\132\212\210\015\367\026\271\077\121\145\053\146\152\213
\321\070\122\242\326\106\021\372\374\232\034\164\236\217\227\013
\002\117\144\306\365\150\323\113\055\377\244\067\036\213\077\277
\104\276\141\106\241\204\075\010\047\114\201\040\167\211\010\352
\147\100\136\154\010\121\137\064\132\214\226\150\315\327\367\211
\302\034\323\062\000\257\122\313\323\140\133\052\072\107\176\153
\060\063\241\142\051\177\112\271\341\055\347\024\043\016\016\030
\107\341\171\374\025\125\320\261\374\045\161\143\165\063\034\043
\053\257\134\331\355\107\167\140\016\073\017\036\322\300\334\144
\005\211\374\170\326\134\054\046\103\251

END

#

Trust for Certificate "AC Raiz Certicamara S.A."

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

```

CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "AC Ra\xC3\xADz Certic\xC3\xA1mara S.A."
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\313\241\305\370\260\343\136\270\271\105\022\323\371\064\242\351
\006\020\323\066
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\223\052\076\366\375\043\151\015\161\040\324\053\107\231\053\246
END
CKA_ISSUER MULTILINE_OCTAL
\060\173\061\013\060\011\006\003\125\004\006\023\002\103\117\061
\107\060\105\006\003\125\004\012\014\076\123\157\143\151\145\144
\141\144\040\103\141\155\145\162\141\154\040\144\145\040\103\145
\162\164\151\146\151\143\141\143\151\303\263\156\040\104\151\147
\151\164\141\154\040\055\040\103\145\162\164\151\143\303\241\155
\141\162\141\040\123\056\101\056\061\043\060\041\006\003\125\004
\003\014\032\101\103\040\122\141\303\255\172\040\103\145\162\164
\151\143\303\241\155\141\162\141\040\123\056\101\056
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\017\007\176\122\223\173\340\025\343\127\360\151\214\313\354
\014
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "TC TrustCenter Class 2 CA II"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter Class 2 CA II"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\166\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\042\060
\040\006\003\125\004\013\023\031\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\062\040\103
\101\061\045\060\043\006\003\125\004\003\023\034\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163

```



```
\040\062\040\103\101\040\111\111
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\166\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\042\060
\040\006\003\125\004\013\023\031\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\062\040\103
\101\061\045\060\043\006\003\125\004\003\023\034\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163
\040\062\040\103\101\040\111\111
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\016\056\152\000\001\000\002\037\327\122\041\054\021\134\073
END
CKA_VALUE MULTILINE_OCTAL
\060\202\004\252\060\202\003\222\240\003\002\001\002\002\016\056
\152\000\001\000\002\037\327\122\041\054\021\134\073\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\060\166\061\013
\060\011\006\003\125\004\006\023\002\104\105\061\034\060\032\006
\003\125\004\012\023\023\124\103\040\124\162\165\163\164\103\145
\156\164\145\162\040\107\155\142\110\061\042\060\040\006\003\125
\004\013\023\031\124\103\040\124\162\165\163\164\103\145\156\164
\145\162\040\103\154\141\163\163\040\062\040\103\101\061\045\060
\043\006\003\125\004\003\023\034\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\062\040\103
\101\040\111\111\060\036\027\015\060\066\060\061\061\062\061\064
\063\070\064\063\132\027\015\062\065\061\062\063\061\062\062\065
\071\065\071\132\060\166\061\013\060\011\006\003\125\004\006\023
\002\104\105\061\034\060\032\006\003\125\004\012\023\023\124\103
\040\124\162\165\163\164\103\145\156\164\145\162\040\107\155\142
\110\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163
\040\062\040\103\101\061\045\060\043\006\003\125\004\003\023\034
\124\103\040\124\162\165\163\164\103\145\156\164\145\162\040\103
\154\141\163\163\040\062\040\103\101\040\111\111\060\202\001\042
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\202\001\017\000\060\202\001\012\002\202\001\001\000\253\200\207
\233\216\360\303\174\207\327\350\044\202\021\263\074\335\103\142
\356\370\303\105\332\350\341\240\137\321\052\262\352\223\150\337
\264\310\326\103\351\304\165\131\177\374\341\035\370\061\160\043
\033\210\236\047\271\173\375\072\322\311\251\351\024\057\220\276
\003\122\301\111\315\366\375\344\010\146\013\127\212\242\102\240
\270\325\177\151\134\220\062\262\227\015\312\112\334\106\076\002
\125\211\123\343\032\132\313\066\306\007\126\367\214\317\021\364
\114\273\060\160\004\225\245\366\071\214\375\163\201\010\175\211
```

\136\062\036\042\251\042\105\113\260\146\056\060\314\237\145\375
\374\313\201\251\361\340\073\257\243\206\321\211\352\304\105\171
\120\135\256\351\041\164\222\115\213\131\202\217\224\343\351\112
\361\347\111\260\024\343\365\142\313\325\162\275\037\271\322\237
\240\315\250\372\001\310\331\015\337\332\374\107\235\263\310\124
\337\111\112\361\041\251\376\030\116\356\110\324\031\273\357\175
\344\342\235\313\133\266\156\377\343\315\132\347\164\202\005\272
\200\045\070\313\344\151\236\257\101\252\032\204\365\002\003\001
\000\001\243\202\001\064\060\202\001\060\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125
\035\016\004\026\004\024\343\253\124\114\200\241\333\126\103\267
\221\112\313\363\202\172\023\134\010\253\060\201\355\006\003\125
\035\037\004\201\345\060\201\342\060\201\337\240\201\334\240\201
\331\206\065\150\164\164\160\072\057\057\167\167\167\056\164\162
\165\163\164\143\145\156\164\145\162\056\144\145\057\143\162\154
\057\166\062\057\164\143\137\143\154\141\163\163\137\062\137\143
\141\137\111\111\056\143\162\154\206\201\237\154\144\141\160\072
\057\057\167\167\167\056\164\162\165\163\164\143\145\156\164\145
\162\056\144\145\057\103\116\075\124\103\045\062\060\124\162\165
\163\164\103\145\156\164\145\162\045\062\060\103\154\141\163\163
\045\062\060\062\045\062\060\103\101\045\062\060\111\111\054\117
\075\124\103\045\062\060\124\162\165\163\164\103\145\156\164\145
\162\045\062\060\107\155\142\110\054\117\125\075\162\157\157\164
\143\145\162\164\163\054\104\103\075\164\162\165\163\164\143\145
\156\164\145\162\054\104\103\075\144\145\077\143\145\162\164\151
\146\151\143\141\164\145\122\145\166\157\143\141\164\151\157\156
\114\151\163\164\077\142\141\163\145\077\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\214\327
\337\176\356\033\200\020\263\203\365\333\021\352\153\113\250\222
\030\331\367\007\071\365\054\276\006\165\172\150\123\025\034\352
\112\355\136\374\043\262\023\240\323\011\377\366\366\056\153\101
\161\171\315\342\155\375\256\131\153\205\035\270\116\042\232\355
\146\071\156\113\224\346\125\374\013\033\213\167\301\123\023\146
\211\331\050\326\213\363\105\112\143\267\375\173\013\141\135\270
\155\276\303\334\133\171\322\355\206\345\242\115\276\136\164\174
\152\355\026\070\037\177\130\201\132\032\353\062\210\055\262\363
\071\167\200\257\136\266\141\165\051\333\043\115\210\312\120\050
\313\205\322\323\020\242\131\156\323\223\124\000\172\242\106\225
\206\005\234\251\031\230\345\061\162\014\000\342\147\331\100\340
\044\063\173\157\054\271\134\253\145\235\054\254\166\352\065\231
\365\227\271\017\044\354\307\166\041\050\145\256\127\350\007\210
\165\112\126\240\322\005\072\244\346\215\222\210\054\363\362\341
\301\306\141\333\101\305\307\233\367\016\032\121\105\302\141\153
\334\144\047\027\214\132\267\332\164\050\315\227\344\275

END

#

```
Trust for Certificate "TC TrustCenter Class 2 CA II"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL
CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter Class 2 CA II"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\256\120\203\355\174\364\134\274\217\141\306\041\376\150\135\171
\102\041\025\156
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\316\170\063\134\131\170\001\156\030\352\271\066\240\271\056\043
END
CKA_ISSUER MULTILINE_OCTAL
\060\166\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\042\060
\040\006\003\125\004\013\023\031\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\062\040\103
\101\061\045\060\043\006\003\125\004\003\023\034\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163
\040\062\040\103\101\040\111\111
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\016\056\152\000\001\000\002\037\327\122\041\054\021\134\073
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "TC TrustCenter Class 3 CA II"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter Class 3 CA II"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\166\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\042\060
\040\006\003\125\004\013\023\031\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\063\040\103
```

\101\061\045\060\043\006\003\125\004\003\023\034\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163
\040\063\040\103\101\040\111\111

END

CKA_ID UTF8 "0"

CKA_ISSUER

MULTILINE_OCTAL

\060\166\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\042\060
\040\006\003\125\004\013\023\031\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\063\040\103
\101\061\045\060\043\006\003\125\004\003\023\034\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163
\040\063\040\103\101\040\111\111

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\016\112\107\000\001\000\002\345\240\135\326\077\000\121\277

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\252\060\202\003\222\240\003\002\001\002\002\016\112
\107\000\001\000\002\345\240\135\326\077\000\121\277\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\060\166\061\013
\060\011\006\003\125\004\006\023\002\104\105\061\034\060\032\006
\003\125\004\012\023\023\124\103\040\124\162\165\163\164\103\145
\156\164\145\162\040\107\155\142\110\061\042\060\040\006\003\125
\004\013\023\031\124\103\040\124\162\165\163\164\103\145\156\164
\145\162\040\103\154\141\163\163\040\063\040\103\101\061\045\060
\043\006\003\125\004\003\023\034\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\063\040\103
\101\040\111\111\060\036\027\015\060\066\060\061\061\062\061\064
\064\061\065\067\132\027\015\062\065\061\062\063\061\062\062\065
\071\065\071\132\060\166\061\013\060\011\006\003\125\004\006\023
\002\104\105\061\034\060\032\006\003\125\004\012\023\023\124\103
\040\124\162\165\163\164\103\145\156\164\145\162\040\107\155\142
\110\061\042\060\040\006\003\125\004\013\023\031\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163
\040\063\040\103\101\061\045\060\043\006\003\125\004\003\023\034
\124\103\040\124\162\165\163\164\103\145\156\164\145\162\040\103
\154\141\163\163\040\063\040\103\101\040\111\111\060\202\001\042
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\202\001\017\000\060\202\001\012\002\202\001\001\000\264\340\273
\121\273\071\134\213\004\305\114\171\034\043\206\061\020\143\103
\125\047\077\306\105\307\244\075\354\011\015\032\036\040\302\126
\036\336\033\067\007\060\042\057\157\361\006\361\253\255\326\310
\253\141\243\057\103\304\260\262\055\374\303\226\151\173\176\212
\344\314\300\071\022\220\102\140\311\314\065\150\356\332\137\220
\126\137\315\034\115\133\130\111\353\016\001\117\144\372\054\074

\211\130\330\057\056\342\260\150\351\042\073\165\211\326\104\032
\145\362\033\227\046\035\050\155\254\350\275\131\035\053\044\366
\326\204\003\146\210\044\000\170\140\361\370\253\376\002\262\153
\373\042\373\065\346\026\321\255\366\056\022\344\372\065\152\345
\031\271\135\333\073\036\032\373\323\377\025\024\010\330\011\152
\272\105\235\024\171\140\175\257\100\212\007\163\263\223\226\323
\164\064\215\072\067\051\336\134\354\365\356\056\061\302\040\334
\276\361\117\177\043\122\331\133\342\144\331\234\252\007\010\265
\105\275\321\320\061\301\253\124\237\251\322\303\142\140\003\361
\273\071\112\222\112\075\012\271\235\305\240\376\067\002\003\001
\000\001\243\202\001\064\060\202\001\060\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125
\035\016\004\026\004\024\324\242\374\237\263\303\330\003\323\127
\134\007\244\320\044\247\300\362\000\324\060\201\355\006\003\125
\035\037\004\201\345\060\201\342\060\201\337\240\201\334\240\201
\331\206\065\150\164\164\160\072\057\057\167\167\167\056\164\162
\165\163\164\143\145\156\164\145\162\056\144\145\057\143\162\154
\057\166\062\057\164\143\137\143\154\141\163\163\137\063\137\143
\141\137\111\111\056\143\162\154\206\201\237\154\144\141\160\072
\057\057\167\167\167\056\164\162\165\163\164\143\145\156\164\145
\162\056\144\145\057\103\116\075\124\103\045\062\060\124\162\165
\163\164\103\145\156\164\145\162\045\062\060\103\154\141\163\163
\045\062\060\063\045\062\060\103\101\045\062\060\111\111\054\117
\075\124\103\045\062\060\124\162\165\163\164\103\145\156\164\145
\162\045\062\060\107\155\142\110\054\117\125\075\162\157\157\164
\143\145\162\164\163\054\104\103\075\164\162\165\163\164\143\145
\156\164\145\162\054\104\103\075\144\145\077\143\145\162\164\151
\146\151\143\141\164\145\122\145\166\157\143\141\164\151\157\156
\114\151\163\164\077\142\141\163\145\077\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\003\202\001\001\000\066\140
\344\160\367\006\040\103\331\043\032\102\362\370\243\262\271\115
\212\264\363\302\232\125\061\174\304\073\147\232\264\337\115\016
\212\223\112\027\213\033\215\312\211\341\317\072\036\254\035\361
\234\062\264\216\131\166\242\101\205\045\067\240\023\320\365\174
\116\325\352\226\342\156\162\301\273\052\376\154\156\370\221\230
\106\374\311\033\127\133\352\310\032\073\077\260\121\230\074\007
\332\054\131\001\332\213\104\350\341\164\375\247\150\335\124\272
\203\106\354\310\106\265\370\257\227\300\073\011\034\217\316\162
\226\075\063\126\160\274\226\313\330\325\175\040\232\203\237\032
\334\071\361\305\162\243\021\003\375\073\102\122\051\333\350\001
\367\233\136\214\326\215\206\116\031\372\274\034\276\305\041\245
\207\236\170\056\066\333\011\161\243\162\064\370\154\343\006\011
\362\136\126\245\323\335\230\372\324\346\006\364\360\266\040\143
\113\352\051\275\252\202\146\036\373\201\252\247\067\255\023\030
\346\222\303\201\301\063\273\210\036\241\347\342\264\275\061\154
\016\121\075\157\373\226\126\200\342\066\027\321\334\344

END

```

#
Trust for Certificate "TC TrustCenter Class 3 CA II"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter Class 3 CA II"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\200\045\357\364\156\160\310\324\162\044\145\204\376\100\073\212
\215\152\333\365
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\126\137\252\200\141\022\027\366\147\041\346\053\155\141\126\216
END
CKA_ISSUER MULTILINE_OCTAL
\060\166\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\042\060
\040\006\003\125\004\013\023\031\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\103\154\141\163\163\040\063\040\103
\101\061\045\060\043\006\003\125\004\003\023\034\124\103\040\124
\162\165\163\164\103\145\156\164\145\162\040\103\154\141\163\163
\040\063\040\103\101\040\111\111
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\016\112\107\000\001\000\002\345\240\135\326\077\000\121\277
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

```

```

#
# Certificate "TC TrustCenter Universal CA I"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL
CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter Universal CA I"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\171\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\044\060

```

\042\006\003\125\004\013\023\033\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\125\156\151\166\145\162\163\141\154
\040\103\101\061\046\060\044\006\003\125\004\003\023\035\124\103
\040\124\162\165\163\164\103\145\156\164\145\162\040\125\156\151
\166\145\162\163\141\154\040\103\101\040\111

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\171\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\044\060
\042\006\003\125\004\013\023\033\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\125\156\151\166\145\162\163\141\154
\040\103\101\061\046\060\044\006\003\125\004\003\023\035\124\103
\040\124\162\165\163\164\103\145\156\164\145\162\040\125\156\151
\166\145\162\163\141\154\040\103\101\040\111

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\016\035\242\000\001\000\002\354\267\140\200\170\215\266\006
END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\335\060\202\002\305\240\003\002\001\002\002\016\035
\242\000\001\000\002\354\267\140\200\170\215\266\006\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\060\171\061\013
\060\011\006\003\125\004\006\023\002\104\105\061\034\060\032\006
\003\125\004\012\023\023\124\103\040\124\162\165\163\164\103\145
\156\164\145\162\040\107\155\142\110\061\044\060\042\006\003\125
\004\013\023\033\124\103\040\124\162\165\163\164\103\145\156\164
\145\162\040\125\156\151\166\145\162\163\141\154\040\103\101\061
\046\060\044\006\003\125\004\003\023\035\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\125\156\151\166\145\162\163
\141\154\040\103\101\040\111\060\036\027\015\060\066\060\063\062
\062\061\065\065\064\062\070\132\027\015\062\065\061\062\063\061
\062\062\065\071\065\071\132\060\171\061\013\060\011\006\003\125
\004\006\023\002\104\105\061\034\060\032\006\003\125\004\012\023
\023\124\103\040\124\162\165\163\164\103\145\156\164\145\162\040
\107\155\142\110\061\044\060\042\006\003\125\004\013\023\033\124
\103\040\124\162\165\163\164\103\145\156\164\145\162\040\125\156
\151\166\145\162\163\141\154\040\103\101\061\046\060\044\006\003
\125\004\003\023\035\124\103\040\124\162\165\163\164\103\145\156
\164\145\162\040\125\156\151\166\145\162\163\141\154\040\103\101
\040\111\060\202\001\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202
\001\001\000\244\167\043\226\104\257\220\364\061\247\020\364\046
\207\234\363\070\331\017\136\336\317\101\350\061\255\306\164\221
\044\226\170\036\011\240\233\232\225\112\112\365\142\174\002\250
\312\254\373\132\004\166\071\336\137\361\371\263\277\363\003\130

\125\322\252\267\343\004\042\321\370\224\332\042\010\000\215\323
\174\046\135\314\167\171\347\054\170\071\250\046\163\016\242\135
\045\151\205\117\125\016\232\357\306\271\104\341\127\075\337\037
\124\042\345\157\145\252\063\204\072\363\316\172\276\125\227\256
\215\022\017\024\063\342\120\160\303\111\207\023\274\121\336\327
\230\022\132\357\072\203\063\222\006\165\213\222\174\022\150\173
\160\152\017\265\233\266\167\133\110\131\235\344\357\132\255\363
\301\236\324\327\105\116\312\126\064\041\274\076\027\133\157\167
\014\110\001\103\051\260\335\077\226\156\346\225\252\014\300\040
\266\375\076\066\047\234\343\134\317\116\201\334\031\273\221\220
\175\354\346\227\004\036\223\314\042\111\327\227\206\266\023\012
\074\103\043\167\176\360\334\346\315\044\037\073\203\233\064\072
\203\064\343\002\003\001\000\001\243\143\060\141\060\037\006\003
\125\035\043\004\030\060\026\200\024\222\244\165\054\244\236\276
\201\104\353\171\374\212\305\225\245\353\020\165\163\060\017\006
\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\016
\006\003\125\035\017\001\001\377\004\004\003\002\001\206\060\035
\006\003\125\035\016\004\026\004\024\222\244\165\054\244\236\276
\201\104\353\171\374\212\305\225\245\353\020\165\163\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001
\000\050\322\340\206\325\346\370\173\360\227\334\042\153\073\225
\024\126\017\021\060\245\232\117\072\260\072\340\006\313\145\365
\355\306\227\047\376\045\362\127\346\136\225\214\076\144\140\025
\132\177\057\015\001\305\261\140\375\105\065\317\360\262\277\006
\331\357\132\276\263\142\041\264\327\253\065\174\123\076\246\047
\361\241\055\332\032\043\235\314\335\354\074\055\236\047\064\135
\017\302\066\171\274\311\112\142\055\355\153\331\175\101\103\174
\266\252\312\355\141\261\067\202\025\011\032\212\026\060\330\354
\311\326\107\162\170\113\020\106\024\216\137\016\257\354\307\057
\253\020\327\266\361\156\354\206\262\302\350\015\222\163\334\242
\364\017\072\277\141\043\020\211\234\110\100\156\160\000\263\323
\272\067\104\130\021\172\002\152\210\360\067\064\360\031\351\254
\324\145\163\366\151\214\144\224\072\171\205\051\260\026\053\014
\202\077\006\234\307\375\020\053\236\017\054\266\236\343\025\277
\331\066\034\272\045\032\122\075\032\354\042\014\034\340\244\242
\075\360\350\071\317\201\300\173\355\135\037\157\305\320\013\327
\230

END

#

Trust for Certificate "TC TrustCenter Universal CA I"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "TC TrustCenter Universal CA I"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\153\057\064\255\211\130\276\142\375\260\153\134\316\273\235\331


```

\117\116\071\363
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\105\341\245\162\305\251\066\144\100\236\365\344\130\204\147\214
END
CKA_ISSUER MULTILINE_OCTAL
\060\171\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\124\103\040\124\162\165
\163\164\103\145\156\164\145\162\040\107\155\142\110\061\044\060
\042\006\003\125\004\013\023\033\124\103\040\124\162\165\163\164
\103\145\156\164\145\162\040\125\156\151\166\145\162\163\141\154
\040\103\101\061\046\060\044\006\003\125\004\003\023\035\124\103
\040\124\162\165\163\164\103\145\156\164\145\162\040\125\156\151
\166\145\162\163\141\154\040\103\101\040\111
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\016\035\242\000\001\000\002\354\267\140\200\170\215\266\006
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Deutsche Telekom Root CA 2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Deutsche Telekom Root CA 2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\161\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\104\145\165\164\163\143
\150\145\040\124\145\154\145\153\157\155\040\101\107\061\037\060
\035\006\003\125\004\013\023\026\124\055\124\145\154\145\123\145
\143\040\124\162\165\163\164\040\103\145\156\164\145\162\061\043
\060\041\006\003\125\004\003\023\032\104\145\165\164\163\143\150
\145\040\124\145\154\145\153\157\155\040\122\157\157\164\040\103
\101\040\062
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\161\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\104\145\165\164\163\143

```

\150\145\040\124\145\154\145\153\157\155\040\101\107\061\037\060
\035\006\003\125\004\013\023\026\124\055\124\145\154\145\123\145
\143\040\124\162\165\163\164\040\103\145\156\164\145\162\061\043
\060\041\006\003\125\004\003\023\032\104\145\165\164\163\143\150
\145\040\124\145\154\145\153\157\155\040\122\157\157\164\040\103
\101\040\062

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\046

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\237\060\202\002\207\240\003\002\001\002\002\001\046
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\161\061\013\060\011\006\003\125\004\006\023\002\104\105\061\034
\060\032\006\003\125\004\012\023\023\104\145\165\164\163\143\150
\145\040\124\145\154\145\153\157\155\040\101\107\061\037\060\035
\006\003\125\004\013\023\026\124\055\124\145\154\145\123\145\143
\040\124\162\165\163\164\040\103\145\156\164\145\162\061\043\060
\041\006\003\125\004\003\023\032\104\145\165\164\163\143\150\145
\040\124\145\154\145\153\157\155\040\122\157\157\164\040\103\101
\040\062\060\036\027\015\071\071\060\067\060\071\061\062\061\061
\060\060\132\027\015\061\071\060\067\060\071\062\063\065\071\060
\060\132\060\161\061\013\060\011\006\003\125\004\006\023\002\104
\105\061\034\060\032\006\003\125\004\012\023\023\104\145\165\164
\163\143\150\145\040\124\145\154\145\153\157\155\040\101\107\061
\037\060\035\006\003\125\004\013\023\026\124\055\124\145\154\145
\123\145\143\040\124\162\165\163\164\040\103\145\156\164\145\162
\061\043\060\041\006\003\125\004\003\023\032\104\145\165\164\163
\143\150\145\040\124\145\154\145\153\157\155\040\122\157\157\164
\040\103\101\040\062\060\202\001\042\060\015\006\011\052\206\110
\206\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001
\012\002\202\001\001\000\253\013\243\065\340\213\051\024\261\024
\205\257\074\020\344\071\157\065\135\112\256\335\352\141\215\225
\111\364\157\144\243\032\140\146\244\251\100\042\204\331\324\245
\345\170\223\016\150\001\255\271\115\134\072\316\323\270\250\102
\100\337\317\243\272\202\131\152\222\033\254\034\232\332\010\053
\045\047\371\151\043\107\361\340\353\054\172\233\365\023\002\320
\176\064\174\302\236\074\000\131\253\365\332\014\365\062\074\053
\254\120\332\326\303\336\203\224\312\250\014\231\062\016\010\110
\126\133\152\373\332\341\130\130\001\111\137\162\101\074\025\006
\001\216\135\255\252\270\223\264\315\236\353\247\350\152\055\122
\064\333\072\357\134\165\121\332\333\363\061\371\356\161\230\062
\304\124\025\104\014\371\233\125\355\255\337\030\010\240\243\206
\212\111\356\123\005\217\031\114\325\336\130\171\233\322\152\034
\102\253\305\325\247\317\150\017\226\344\341\141\230\166\141\310
\221\174\326\076\000\342\221\120\207\341\235\012\346\255\227\322
\035\306\072\175\313\274\332\003\064\325\216\133\001\365\152\007

```
\267\026\266\156\112\177\002\003\001\000\001\243\102\060\100\060
\035\006\003\125\035\016\004\026\004\024\061\303\171\033\272\365
\123\327\027\340\211\172\055\027\154\012\263\053\235\063\060\017
\006\003\125\035\023\004\010\060\006\001\001\377\002\001\005\060
\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202
\001\001\000\224\144\131\255\071\144\347\051\353\023\376\132\303
\213\023\127\310\004\044\360\164\167\300\140\343\147\373\351\211
\246\203\277\226\202\174\156\324\303\075\357\236\200\156\273\051
\264\230\172\261\073\124\353\071\027\107\176\032\216\013\374\037
\061\131\061\004\262\316\027\363\054\307\142\066\125\342\042\330
\211\125\264\230\110\252\144\372\326\034\066\330\104\170\132\132
\043\072\127\227\365\172\060\117\256\237\152\114\113\053\216\240
\003\343\076\340\251\324\322\173\322\263\250\342\162\074\255\236
\377\200\131\344\233\105\264\366\073\260\315\071\031\230\062\345
\352\041\141\220\344\061\041\216\064\261\367\057\065\112\205\020
\332\347\212\067\041\276\131\143\340\362\205\210\061\123\324\124
\024\205\160\171\364\056\006\167\047\165\057\037\270\212\371\376
\305\272\330\066\344\203\354\347\145\267\277\143\132\363\106\257
\201\224\067\324\101\214\326\043\326\036\317\365\150\033\104\143
\242\132\272\247\065\131\241\345\160\005\233\016\043\127\231\224
\012\155\272\071\143\050\206\222\363\030\204\330\373\321\317\005
\126\144\127
```

END

#

Trust for Certificate "Deutsche Telekom Root CA 2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE

CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Deutsche Telekom Root CA 2"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\205\244\010\300\234\031\076\135\121\130\175\315\326\023\060\375
\214\336\067\277
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\164\001\112\221\261\010\304\130\316\107\315\360\335\021\123\010
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\161\061\013\060\011\006\003\125\004\006\023\002\104\105\061
\034\060\032\006\003\125\004\012\023\023\104\145\165\164\163\143
\150\145\040\124\145\154\145\153\157\155\040\101\107\061\037\060
\035\006\003\125\004\013\023\026\124\055\124\145\154\145\123\145
\143\040\124\162\165\163\164\040\103\145\156\164\145\162\061\043
\060\041\006\003\125\004\003\023\032\104\145\165\164\163\143\150
\145\040\124\145\154\145\153\157\155\040\122\157\157\164\040\103
```

```

\101\040\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\046
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "ComSign CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "ComSign CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\064\061\023\060\021\006\003\125\004\003\023\012\103\157\155
\123\151\147\156\040\103\101\061\020\060\016\006\003\125\004\012
\023\007\103\157\155\123\151\147\156\061\013\060\011\006\003\125
\004\006\023\002\111\114
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\064\061\023\060\021\006\003\125\004\003\023\012\103\157\155
\123\151\147\156\040\103\101\061\020\060\016\006\003\125\004\012
\023\007\103\157\155\123\151\147\156\061\013\060\011\006\003\125
\004\006\023\002\111\114
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\024\023\226\203\024\125\214\352\173\143\345\374\064\207
\167\104
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\223\060\202\002\173\240\003\002\001\002\002\020\024
\023\226\203\024\125\214\352\173\143\345\374\064\207\167\104\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\064
\061\023\060\021\006\003\125\004\003\023\012\103\157\155\123\151
\147\156\040\103\101\061\020\060\016\006\003\125\004\012\023\007
\103\157\155\123\151\147\156\061\013\060\011\006\003\125\004\006
\023\002\111\114\060\036\027\015\060\064\060\063\062\064\061\061
\063\062\061\070\132\027\015\062\071\060\063\061\071\061\065\060
\062\061\070\132\060\064\061\023\060\021\006\003\125\004\003\023
\012\103\157\155\123\151\147\156\040\103\101\061\020\060\016\006

```

\003\125\004\012\023\007\103\157\155\123\151\147\156\061\013\060
\011\006\003\125\004\006\023\002\111\114\060\202\001\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001
\017\000\060\202\001\012\002\202\001\001\000\360\344\124\151\053
\323\307\217\152\104\344\176\130\047\370\013\320\344\224\022\212
\361\033\070\070\057\037\061\234\006\324\054\247\336\013\052\256
\032\240\343\236\152\277\237\074\307\156\242\371\213\144\154\072
\255\205\125\121\124\245\070\125\270\253\203\004\362\077\144\066
\367\300\215\103\103\152\146\321\367\027\052\325\357\066\372\060
\020\102\327\123\315\371\372\063\163\114\263\351\204\040\212\326
\101\047\065\344\070\372\224\233\270\172\344\171\037\063\373\033
\330\041\011\050\174\115\030\151\136\144\212\172\031\223\312\176
\354\363\162\347\067\007\130\131\050\254\102\371\305\377\315\077
\347\245\372\070\261\320\014\307\331\122\032\123\326\201\314\102
\172\065\133\355\113\072\172\366\265\216\314\377\017\174\344\140
\066\207\057\255\360\241\045\175\377\322\113\021\210\160\124\246
\101\250\147\123\122\102\136\344\064\236\344\276\243\354\252\142
\135\335\303\114\246\202\101\344\063\013\254\311\063\017\144\202
\127\052\375\014\255\066\341\014\256\113\305\357\073\231\331\043
\263\133\135\264\127\354\164\160\014\052\117\002\003\001\000\001
\243\201\240\060\201\235\060\014\006\003\125\035\023\004\005\060
\003\001\001\377\060\075\006\003\125\035\037\004\066\060\064\060
\062\240\060\240\056\206\054\150\164\164\160\072\057\057\146\145
\144\151\162\056\143\157\155\163\151\147\156\056\143\157\056\151
\154\057\143\162\154\057\103\157\155\123\151\147\156\103\101\056
\143\162\154\060\016\006\003\125\035\017\001\001\377\004\004\003
\002\001\206\060\037\006\003\125\035\043\004\030\060\026\200\024
\113\001\233\076\126\032\145\066\166\313\173\227\252\222\005\356
\062\347\050\061\060\035\006\003\125\035\016\004\026\004\024\113
\001\233\076\126\032\145\066\166\313\173\227\252\222\005\356\062
\347\050\061\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\003\202\001\001\000\320\331\245\176\376\051\140\105\235
\176\203\317\156\274\107\156\365\032\236\124\166\102\161\264\074
\130\077\055\100\045\102\366\201\234\361\211\020\310\016\252\170
\117\070\011\127\260\074\300\010\374\065\216\361\110\121\215\014
\161\164\272\204\304\327\162\233\204\174\070\116\144\006\047\052
\341\247\265\354\010\231\264\012\015\324\205\163\310\022\341\065
\355\361\005\061\035\163\231\014\353\226\312\335\323\346\205\252
\360\212\373\165\301\362\011\074\145\145\144\363\114\330\255\313
\210\151\363\344\203\267\014\275\027\132\226\027\312\133\377\255
\273\034\351\055\204\200\330\041\276\205\122\331\324\164\271\151
\205\272\115\355\050\062\353\371\141\112\344\304\066\036\031\334
\157\204\021\037\225\365\203\050\030\250\063\222\103\047\335\135
\023\004\105\117\207\325\106\315\075\250\272\360\363\270\126\044
\105\353\067\307\341\166\117\162\071\030\337\176\164\162\307\163
\055\071\352\140\346\255\021\242\126\207\173\303\150\232\376\370
\214\160\250\337\145\062\364\244\100\214\241\302\104\003\016\224
\000\147\240\161\000\202\110

END

#

Trust for Certificate "ComSign CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "ComSign CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\341\244\133\024\032\041\332\032\171\364\032\102\251\141\326\151
\315\006\064\301

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

\315\364\071\363\265\030\120\327\076\244\305\221\240\076\041\113

END

CKA_ISSUER MULTILINE_OCTAL

\060\064\061\023\060\021\006\003\125\004\003\023\012\103\157\155
\123\151\147\156\040\103\101\061\020\060\016\006\003\125\004\012
\023\007\103\157\155\123\151\147\156\061\013\060\011\006\003\125
\004\006\023\002\111\114

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\024\023\226\203\024\125\214\352\173\143\345\374\064\207
\167\104

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "ComSign Secured CA"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "ComSign Secured CA"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT

MULTILINE_OCTAL

\060\074\061\033\060\031\006\003\125\004\003\023\022\103\157\155
\123\151\147\156\040\123\145\143\165\162\145\144\040\103\101\061
\020\060\016\006\003\125\004\012\023\007\103\157\155\123\151\147
\156\061\013\060\011\006\003\125\004\006\023\002\111\114

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\074\061\033\060\031\006\003\125\004\003\023\022\103\157\155
\123\151\147\156\040\123\145\143\165\162\145\144\040\103\101\061
\020\060\016\006\003\125\004\012\023\007\103\157\155\123\151\147
\156\061\013\060\011\006\003\125\004\006\023\002\111\114

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\021\000\307\050\107\011\263\270\154\105\214\035\372\044\365
\066\116\351

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\253\060\202\002\223\240\003\002\001\002\002\021\000
\307\050\107\011\263\270\154\105\214\035\372\044\365\066\116\351
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\074\061\033\060\031\006\003\125\004\003\023\022\103\157\155\123
\151\147\156\040\123\145\143\165\162\145\144\040\103\101\061\020
\060\016\006\003\125\004\012\023\007\103\157\155\123\151\147\156
\061\013\060\011\006\003\125\004\006\023\002\111\114\060\036\027
\015\060\064\060\063\062\064\061\061\063\067\062\060\132\027\015
\062\071\060\063\061\066\061\065\060\064\065\066\132\060\074\061
\033\060\031\006\003\125\004\003\023\022\103\157\155\123\151\147
\156\040\123\145\143\165\162\145\144\040\103\101\061\020\060\016
\006\003\125\004\012\023\007\103\157\155\123\151\147\156\061\013
\060\011\006\003\125\004\006\023\002\111\114\060\202\001\042\060
\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202
\001\017\000\060\202\001\012\002\202\001\001\000\306\265\150\137
\035\224\025\303\244\010\125\055\343\240\127\172\357\351\164\052
\273\271\174\127\111\032\021\136\117\051\207\014\110\326\152\347
\217\324\176\127\044\271\006\211\344\034\074\352\254\343\332\041
\200\163\041\012\357\171\230\154\037\010\377\241\120\175\362\230
\033\311\124\157\076\245\050\354\041\004\017\105\273\007\075\241
\300\372\052\230\035\116\006\223\373\365\210\073\253\137\313\026
\277\346\363\236\112\207\355\031\352\302\237\103\344\361\201\245
\177\020\117\076\321\112\142\255\123\033\313\203\377\007\145\245
\222\055\146\251\133\270\132\364\035\264\041\221\112\027\173\236
\062\376\126\044\071\262\124\204\103\365\204\302\330\274\101\220
\314\235\326\150\332\351\202\120\251\073\150\317\265\135\002\224
\140\026\261\103\331\103\135\335\135\207\156\352\273\263\311\153
\366\003\224\011\160\336\026\021\172\053\350\166\217\111\020\230
\167\271\143\134\213\063\227\165\366\013\214\262\253\133\336\164
\040\045\077\343\363\021\371\207\150\206\065\161\303\035\214\055
\353\345\032\254\017\163\325\202\131\100\200\323\002\003\001\000
\001\243\201\247\060\201\244\060\014\006\003\125\035\023\004\005
\060\003\001\001\377\060\104\006\003\125\035\037\004\075\060\073
\060\071\240\067\240\065\206\063\150\164\164\160\072\057\057\146
\145\144\151\162\056\143\157\155\163\151\147\156\056\143\157\056
\151\154\057\143\162\154\057\103\157\155\123\151\147\156\123\145

```
\143\165\162\145\144\103\101\056\143\162\154\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\206\060\037\006\003\125
\035\043\004\030\060\026\200\024\301\113\355\160\266\367\076\174
\000\073\000\217\307\076\016\105\237\036\135\354\060\035\006\003
\125\035\016\004\026\004\024\301\113\355\160\266\367\076\174\000
\073\000\217\307\076\016\105\237\036\135\354\060\015\006\011\052
\206\110\206\367\015\001\001\005\005\000\003\202\001\001\000\026
\317\356\222\023\120\253\173\024\236\063\266\102\040\152\324\025
\275\011\253\374\162\350\357\107\172\220\254\121\301\144\116\351
\210\275\103\105\201\343\146\043\077\022\206\115\031\344\005\260
\346\067\302\215\332\006\050\311\017\211\244\123\251\165\077\260
\226\373\253\114\063\125\371\170\046\106\157\033\066\230\373\102
\166\301\202\271\216\336\373\105\371\143\033\142\073\071\006\312
\167\172\250\074\011\317\154\066\075\017\012\105\113\151\026\032
\105\175\063\003\145\371\122\161\220\046\225\254\114\014\365\213
\223\077\314\165\164\205\230\272\377\142\172\115\037\211\376\256
\275\224\000\231\277\021\245\334\340\171\305\026\013\175\002\141
\035\352\205\371\002\025\117\347\132\211\116\024\157\343\067\113
\205\365\301\074\141\340\375\005\101\262\222\177\303\035\240\320
\256\122\144\140\153\030\306\046\234\330\365\144\344\066\032\142
\237\212\017\076\377\155\116\031\126\116\040\221\154\237\064\063
\072\064\127\120\072\157\201\136\006\306\365\076\174\116\216\053
\316\145\006\056\135\322\052\123\164\136\323\156\047\236\217
END
```

#

Trust for Certificate "ComSign Secured CA"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "ComSign Secured CA"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\371\315\016\054\332\166\044\301\217\275\360\360\253\266\105\270
\367\376\325\172
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\100\001\045\006\215\041\103\152\016\103\000\234\347\103\363\325
```

END

CKA_ISSUER

MULTILINE_OCTAL

```
\060\074\061\033\060\031\006\003\125\004\003\023\022\103\157\155
\123\151\147\156\040\123\145\143\165\162\145\144\040\103\101\061
\020\060\016\006\003\125\004\012\023\007\103\157\155\123\151\147
\156\061\013\060\011\006\003\125\004\006\023\002\111\114
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\021\000\307\050\107\011\263\270\154\105\214\035\372\044\365
```



```
\066\116\351
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Cybertrust Global Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Cybertrust Global Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\073\061\030\060\026\006\003\125\004\012\023\017\103\171\142
\145\162\164\162\165\163\164\054\040\111\156\143\061\037\060\035
\006\003\125\004\003\023\026\103\171\142\145\162\164\162\165\163
\164\040\107\154\157\142\141\154\040\122\157\157\164
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\073\061\030\060\026\006\003\125\004\012\023\017\103\171\142
\145\162\164\162\165\163\164\054\040\111\156\143\061\037\060\035
\006\003\125\004\003\023\026\103\171\142\145\162\164\162\165\163
\164\040\107\154\157\142\141\154\040\122\157\157\164
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\013\004\000\000\000\000\001\017\205\252\055\110
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\241\060\202\002\211\240\003\002\001\002\002\013\004
\000\000\000\000\001\017\205\252\055\110\060\015\006\011\052\206
\110\206\367\015\001\001\005\005\000\060\073\061\030\060\026\006
\003\125\004\012\023\017\103\171\142\145\162\164\162\165\163\164
\054\040\111\156\143\061\037\060\035\006\003\125\004\003\023\026
\103\171\142\145\162\164\162\165\163\164\040\107\154\157\142\141
\154\040\122\157\157\164\060\036\027\015\060\066\061\062\061\065
\060\070\060\060\060\060\132\027\015\062\061\061\062\061\065\060
\070\060\060\060\060\132\060\073\061\030\060\026\006\003\125\004
\012\023\017\103\171\142\145\162\164\162\165\163\164\054\040\111
\156\143\061\037\060\035\006\003\125\004\003\023\026\103\171\142
\145\162\164\162\165\163\164\040\107\154\157\142\141\154\040\122
\157\157\164\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002
```

\202\001\001\000\370\310\274\275\024\120\146\023\377\360\323\171
\354\043\362\267\032\307\216\205\361\022\163\246\031\252\020\333
\234\242\145\164\132\167\076\121\175\126\366\334\043\266\324\355
\137\130\261\067\115\325\111\016\156\365\152\207\326\322\214\322
\047\306\342\377\066\237\230\145\240\023\116\306\052\144\233\325
\220\022\317\024\006\364\073\343\324\050\276\350\016\370\253\116
\110\224\155\216\225\061\020\134\355\242\055\275\325\072\155\262
\034\273\140\300\106\113\001\365\111\256\176\106\212\320\164\215
\241\014\002\316\356\374\347\217\270\153\146\363\177\104\000\277
\146\045\024\053\335\020\060\035\007\226\077\115\366\153\270\217
\267\173\014\245\070\353\336\107\333\325\135\071\374\210\247\363
\327\052\164\361\350\132\242\073\237\120\272\246\214\105\065\302
\120\145\225\334\143\202\357\335\277\167\115\234\142\311\143\163
\026\320\051\017\111\251\110\360\263\252\267\154\305\247\060\071
\100\135\256\304\342\135\046\123\360\316\034\043\010\141\250\224
\031\272\004\142\100\354\037\070\160\167\022\006\161\247\060\030
\135\045\047\245\002\003\001\000\001\243\201\245\060\201\242\060
\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060
\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377
\060\035\006\003\125\035\016\004\026\004\024\266\010\173\015\172
\314\254\040\114\206\126\062\136\317\253\156\205\055\160\127\060
\077\006\003\125\035\037\004\070\060\066\060\064\240\062\240\060
\206\056\150\164\164\160\072\057\057\167\167\167\062\056\160\165
\142\154\151\143\055\164\162\165\163\164\056\143\157\155\057\143
\162\154\057\143\164\057\143\164\162\157\157\164\056\143\162\154
\060\037\006\003\125\035\043\004\030\060\026\200\024\266\010\173
\015\172\314\254\040\114\206\126\062\136\317\253\156\205\055\160
\127\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\003\202\001\001\000\126\357\012\043\240\124\116\225\227\311\370
\211\332\105\301\324\243\000\045\364\037\023\253\267\243\205\130
\151\302\060\255\330\025\212\055\343\311\315\201\132\370\163\043
\132\247\174\005\363\375\042\073\016\321\006\304\333\066\114\163
\004\216\345\260\042\344\305\363\056\245\331\043\343\270\116\112
\040\247\156\002\044\237\042\140\147\173\213\035\162\011\305\061
\134\351\171\237\200\107\075\255\241\013\007\024\075\107\377\003
\151\032\014\013\104\347\143\045\247\177\262\311\270\166\204\355
\043\366\175\007\253\105\176\323\337\263\277\351\212\266\315\250
\242\147\053\122\325\267\145\360\071\114\143\240\221\171\223\122
\017\124\335\203\273\237\321\217\247\123\163\303\313\377\060\354
\174\004\270\330\104\037\223\137\161\011\042\267\156\076\352\034
\003\116\235\032\040\141\373\201\067\354\136\374\012\105\253\327
\347\027\125\320\240\352\140\233\246\366\343\214\133\051\302\006
\140\024\235\055\227\114\251\223\025\235\141\304\001\137\110\326
\130\275\126\061\022\116\021\310\041\340\263\021\221\145\333\264
\246\210\070\316\125

END

#

```

Trust for Certificate "Cybertrust Global Root"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Cybertrust Global Root"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\137\103\345\261\277\370\170\214\254\034\307\312\112\232\306\042
\053\314\064\306
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\162\344\112\207\343\151\100\200\167\352\274\343\364\377\360\341
END
CKA_ISSUER MULTILINE_OCTAL
\060\073\061\030\060\026\006\003\125\004\012\023\017\103\171\142
\145\162\164\162\165\163\164\054\040\111\156\143\061\037\060\035
\006\003\125\004\003\023\026\103\171\142\145\162\164\162\165\163
\164\040\107\154\157\142\141\154\040\122\157\157\164
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\013\004\000\000\000\000\001\017\205\252\055\110
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "ePKI Root Certification Authority"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "ePKI Root Certification Authority"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\136\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150
\167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040
\114\164\144\056\061\052\060\050\006\003\125\004\013\014\041\145
\120\113\111\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL

```

\060\136\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150
\167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040
\114\164\144\056\061\052\060\050\006\003\125\004\013\014\041\145
\120\113\111\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\025\310\275\145\107\134\257\270\227\000\136\344\006\322
\274\235

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\260\060\202\003\230\240\003\002\001\002\002\020\025
\310\275\145\107\134\257\270\227\000\136\344\006\322\274\235\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060\136
\061\013\060\011\006\003\125\004\006\023\002\124\127\061\043\060
\041\006\003\125\004\012\014\032\103\150\165\156\147\150\167\141
\040\124\145\154\145\143\157\155\040\103\157\056\054\040\114\164
\144\056\061\052\060\050\006\003\125\004\013\014\041\145\120\113
\111\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\036
\027\015\060\064\061\062\062\060\060\062\063\061\062\067\132\027
\015\063\064\061\062\062\060\060\062\063\061\062\067\132\060\136
\061\013\060\011\006\003\125\004\006\023\002\124\127\061\043\060
\041\006\003\125\004\012\014\032\103\150\165\156\147\150\167\141
\040\124\145\154\145\143\157\155\040\103\157\056\054\040\114\164
\144\056\061\052\060\050\006\003\125\004\013\014\041\145\120\113
\111\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\202
\002\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\202\002\017\000\060\202\002\012\002\202\002\001\000\341
\045\017\356\215\333\210\063\165\147\315\255\037\175\072\116\155
\235\323\057\024\363\143\164\313\001\041\152\067\352\204\120\007
\113\046\133\011\103\154\041\236\152\310\325\003\365\140\151\217
\314\360\042\344\037\347\367\152\042\061\267\054\025\362\340\376
\000\152\103\377\207\145\306\265\032\301\247\114\155\042\160\041
\212\061\362\227\164\211\011\022\046\034\236\312\331\022\242\225
\074\332\351\147\277\010\240\144\343\326\102\267\105\357\227\364
\366\365\327\265\112\025\002\130\175\230\130\113\140\274\315\327
\015\232\023\063\123\321\141\371\172\325\327\170\263\232\063\367
\000\206\316\035\115\224\070\257\250\354\170\121\160\212\134\020
\203\121\041\367\021\075\064\206\136\345\110\315\227\201\202\065
\114\031\354\145\366\153\305\005\241\356\107\023\326\263\041\047
\224\020\012\331\044\073\272\276\104\023\106\060\077\227\074\330
\327\327\152\356\073\070\343\053\324\227\016\271\033\347\007\111
\177\067\052\371\167\170\317\124\355\133\106\235\243\200\016\221
\103\301\326\133\137\024\272\237\246\215\044\107\100\131\277\162
\070\262\066\154\067\377\231\321\135\016\131\012\253\151\367\300

\262\004\105\172\124\000\256\276\123\366\265\347\341\370\074\243
\061\322\251\376\041\122\144\305\246\147\360\165\007\006\224\024
\201\125\306\047\344\001\217\027\301\152\161\327\276\113\373\224
\130\175\176\021\063\261\102\367\142\154\030\326\317\011\150\076
\177\154\366\036\217\142\255\245\143\333\011\247\037\042\102\101
\036\157\231\212\076\327\371\077\100\172\171\260\245\001\222\322
\235\075\010\025\245\020\001\055\263\062\166\250\225\015\263\172
\232\373\007\020\170\021\157\341\217\307\272\017\045\032\164\052
\345\034\230\101\231\337\041\207\350\225\006\152\012\263\152\107
\166\145\366\072\317\217\142\027\031\173\012\050\315\032\322\203
\036\041\307\054\277\276\377\141\150\267\147\033\273\170\115\215
\316\147\345\344\301\216\267\043\146\342\235\220\165\064\230\251
\066\053\212\232\224\271\235\354\314\212\261\370\045\211\134\132
\266\057\214\037\155\171\044\247\122\150\303\204\065\342\146\215
\143\016\045\115\325\031\262\346\171\067\247\042\235\124\061\002
\003\001\000\001\243\152\060\150\060\035\006\003\125\035\016\004
\026\004\024\036\014\367\266\147\362\341\222\046\011\105\300\125
\071\056\167\077\102\112\242\060\014\006\003\125\035\023\004\005
\060\003\001\001\377\060\071\006\004\147\052\007\000\004\061\060
\057\060\055\002\001\000\060\011\006\005\053\016\003\002\032\005
\000\060\007\006\005\147\052\003\000\000\004\024\105\260\302\307
\012\126\174\356\133\170\014\225\371\030\123\301\246\034\330\020
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\002\001\000\011\263\203\123\131\001\076\225\111\271\361\201
\272\371\166\040\043\265\047\140\164\324\152\231\064\136\154\000
\123\331\237\362\246\261\044\007\104\152\052\306\245\216\170\022
\350\107\331\130\033\023\052\136\171\233\237\012\052\147\246\045
\077\006\151\126\163\303\212\146\110\373\051\201\127\164\006\312
\234\352\050\350\070\147\046\053\361\325\265\077\145\223\370\066
\135\216\215\215\100\040\207\031\352\357\047\300\075\264\071\017
\045\173\150\120\164\125\234\014\131\175\132\075\101\224\045\122
\010\340\107\054\025\061\031\325\277\007\125\306\273\022\265\227
\364\137\203\205\272\161\301\331\154\201\021\166\012\012\260\277
\202\227\367\352\075\372\372\354\055\251\050\224\073\126\335\322
\121\056\256\300\275\010\025\214\167\122\064\226\326\233\254\323
\035\216\141\017\065\173\233\256\071\151\013\142\140\100\040\066
\217\257\373\066\356\055\010\112\035\270\277\233\134\370\352\245
\033\240\163\246\330\370\156\340\063\004\137\150\252\047\207\355
\331\301\220\234\355\275\343\152\065\257\143\337\253\030\331\272
\346\351\112\352\120\212\017\141\223\036\342\055\031\342\060\224
\065\222\135\016\266\007\257\031\200\217\107\220\121\113\056\115
\335\205\342\322\012\122\012\027\232\374\032\260\120\002\345\001
\243\143\067\041\114\104\304\233\121\231\021\016\163\234\006\217
\124\056\247\050\136\104\071\207\126\055\067\275\205\104\224\341
\014\113\054\234\303\222\205\064\141\313\017\270\233\112\103\122
\376\064\072\175\270\351\051\334\166\251\310\060\370\024\161\200
\306\036\066\110\164\042\101\134\207\202\350\030\161\213\101\211
\104\347\176\130\133\250\270\215\023\351\247\154\303\107\355\263

```
\032\235\142\256\215\202\352\224\236\335\131\020\303\255\335\342
\115\343\061\325\307\354\350\362\260\376\222\036\026\012\032\374
\331\363\370\047\266\311\276\035\264\154\144\220\177\364\344\304
\133\327\067\256\102\016\335\244\032\157\174\210\124\305\026\156
\341\172\150\056\370\072\277\015\244\074\211\073\170\247\116\143
\203\004\041\010\147\215\362\202\111\320\133\375\261\315\017\203
\204\324\076\040\205\367\112\075\053\234\375\052\012\011\115\352
\201\370\021\234
```

END

#

Trust for Certificate "ePKI Root Certification Authority"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "ePKI Root Certification Authority"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\147\145\015\361\176\216\176\133\202\100\244\364\126\113\317\342
\075\151\306\360
```

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

```
\033\056\000\312\046\006\220\075\255\376\157\025\150\323\153\263
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\136\061\013\060\011\006\003\125\004\006\023\002\124\127\061
\043\060\041\006\003\125\004\012\014\032\103\150\165\156\147\150
\167\141\040\124\145\154\145\143\157\155\040\103\157\056\054\040
\114\164\144\056\061\052\060\050\006\003\125\004\013\014\041\145
\120\113\111\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\020\025\310\275\145\107\134\257\270\227\000\136\344\006\322
\274\235
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "TUBITAK UEKAE Kok Sertifika Hizmet Saglayicisi - Surum 3"

#

CKA_CLASS CK_OBJECT_CLASS

CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "T\xC3\x9c\x42\xC4\xB0TAK UEKAE K\xC3\xB6k Sertifika Hizmet
Sa\xC4\x9Flay\xC4\xB1\x63\xC4\xB1s\xC4\xB1 - S\xC3\xBCr\xC3\xBCm 3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL

\060\202\001\053\061\013\060\011\006\003\125\004\006\023\002\124
\122\061\030\060\026\006\003\125\004\007\014\017\107\145\142\172
\145\040\055\040\113\157\143\141\145\154\151\061\107\060\105\006
\003\125\004\012\014\076\124\303\274\162\153\151\171\145\040\102
\151\154\151\155\163\145\154\040\166\145\040\124\145\153\156\157
\154\157\152\151\153\040\101\162\141\305\237\164\304\261\162\155
\141\040\113\165\162\165\155\165\040\055\040\124\303\234\102\304
\260\124\101\113\061\110\060\106\006\003\125\004\013\014\077\125
\154\165\163\141\154\040\105\154\145\153\164\162\157\156\151\153
\040\166\145\040\113\162\151\160\164\157\154\157\152\151\040\101
\162\141\305\237\164\304\261\162\155\141\040\105\156\163\164\151
\164\303\274\163\303\274\040\055\040\125\105\113\101\105\061\043
\060\041\006\003\125\004\013\014\032\113\141\155\165\040\123\145
\162\164\151\146\151\153\141\163\171\157\156\040\115\145\162\153
\145\172\151\061\112\060\110\006\003\125\004\003\014\101\124\303
\234\102\304\260\124\101\113\040\125\105\113\101\105\040\113\303
\266\153\040\123\145\162\164\151\146\151\153\141\040\110\151\172
\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304\261
\163\304\261\040\055\040\123\303\274\162\303\274\155\040\063

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\202\001\053\061\013\060\011\006\003\125\004\006\023\002\124
\122\061\030\060\026\006\003\125\004\007\014\017\107\145\142\172
\145\040\055\040\113\157\143\141\145\154\151\061\107\060\105\006
\003\125\004\012\014\076\124\303\274\162\153\151\171\145\040\102
\151\154\151\155\163\145\154\040\166\145\040\124\145\153\156\157
\154\157\152\151\153\040\101\162\141\305\237\164\304\261\162\155
\141\040\113\165\162\165\155\165\040\055\040\124\303\234\102\304
\260\124\101\113\061\110\060\106\006\003\125\004\013\014\077\125
\154\165\163\141\154\040\105\154\145\153\164\162\157\156\151\153
\040\166\145\040\113\162\151\160\164\157\154\157\152\151\040\101
\162\141\305\237\164\304\261\162\155\141\040\105\156\163\164\151
\164\303\274\163\303\274\040\055\040\125\105\113\101\105\061\043
\060\041\006\003\125\004\013\014\032\113\141\155\165\040\123\145
\162\164\151\146\151\153\141\163\171\157\156\040\115\145\162\153
\145\172\151\061\112\060\110\006\003\125\004\003\014\101\124\303
\234\102\304\260\124\101\113\040\125\105\113\101\105\040\113\303
\266\153\040\123\145\162\164\151\146\151\153\141\040\110\151\172
\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304\261
\163\304\261\040\055\040\123\303\274\162\303\274\155\040\063

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\001\021

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\027\060\202\003\377\240\003\002\001\002\002\001\021
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\202\001\053\061\013\060\011\006\003\125\004\006\023\002\124\122
\061\030\060\026\006\003\125\004\007\014\017\107\145\142\172\145
\040\055\040\113\157\143\141\145\154\151\061\107\060\105\006\003
\125\004\012\014\076\124\303\274\162\153\151\171\145\040\102\151
\154\151\155\163\145\154\040\166\145\040\124\145\153\156\157\154
\157\152\151\153\040\101\162\141\305\237\164\304\261\162\155\141
\040\113\165\162\165\155\165\040\055\040\124\303\234\102\304\260
\124\101\113\061\110\060\106\006\003\125\004\013\014\077\125\154
\165\163\141\154\040\105\154\145\153\164\162\157\156\151\153\040
\166\145\040\113\162\151\160\164\157\154\157\152\151\040\101\162
\141\305\237\164\304\261\162\155\141\040\105\156\163\164\151\164
\303\274\163\303\274\040\055\040\125\105\113\101\105\061\043\060
\041\006\003\125\004\013\014\032\113\141\155\165\040\123\145\162
\164\151\146\151\153\141\163\171\157\156\040\115\145\162\153\145
\172\151\061\112\060\110\006\003\125\004\003\014\101\124\303\234
\102\304\260\124\101\113\040\125\105\113\101\105\040\113\303\266
\153\040\123\145\162\164\151\146\151\153\141\040\110\151\172\155
\145\164\040\123\141\304\237\154\141\171\304\261\143\304\261\163
\304\261\040\055\040\123\303\274\162\303\274\155\040\063\060\036
\027\015\060\067\060\070\062\064\061\061\063\067\060\067\132\027
\015\061\067\060\070\062\061\061\061\063\067\060\067\132\060\202
\001\053\061\013\060\011\006\003\125\004\006\023\002\124\122\061
\030\060\026\006\003\125\004\007\014\017\107\145\142\172\145\040
\055\040\113\157\143\141\145\154\151\061\107\060\105\006\003\125
\004\012\014\076\124\303\274\162\153\151\171\145\040\102\151\154
\151\155\163\145\154\040\166\145\040\124\145\153\156\157\154\157
\152\151\153\040\101\162\141\305\237\164\304\261\162\155\141\040
\113\165\162\165\155\165\040\055\040\124\303\234\102\304\260\124
\101\113\061\110\060\106\006\003\125\004\013\014\077\125\154\165
\163\141\154\040\105\154\145\153\164\162\157\156\151\153\040\166
\145\040\113\162\151\160\164\157\154\157\152\151\040\101\162\141
\305\237\164\304\261\162\155\141\040\105\156\163\164\151\164\303
\274\163\303\274\040\055\040\125\105\113\101\105\061\043\060\041
\006\003\125\004\013\014\032\113\141\155\165\040\123\145\162\164
\151\146\151\153\141\163\171\157\156\040\115\145\162\153\145\172
\151\061\112\060\110\006\003\125\004\003\014\101\124\303\234\102
\304\260\124\101\113\040\125\105\113\101\105\040\113\303\266\153
\040\123\145\162\164\151\146\151\153\141\040\110\151\172\155\145
\164\040\123\141\304\237\154\141\171\304\261\143\304\261\163\304
\261\040\055\040\123\303\274\162\303\274\155\040\063\060\202\001

\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000
\003\202\001\017\000\060\202\001\012\002\202\001\001\000\212\155
\113\377\020\210\072\303\366\176\224\350\352\040\144\160\256\041
\201\276\072\173\074\333\361\035\122\177\131\372\363\042\114\225
\240\220\274\110\116\021\253\373\267\265\215\172\203\050\214\046
\106\330\116\225\100\207\141\237\305\236\155\201\207\127\154\212
\073\264\146\352\314\100\374\343\252\154\262\313\001\333\062\277
\322\353\205\317\241\015\125\303\133\070\127\160\270\165\306\171
\321\024\060\355\033\130\133\153\357\065\362\241\041\116\305\316
\174\231\137\154\271\270\042\223\120\247\315\114\160\152\276\152
\005\177\023\234\053\036\352\376\107\316\004\245\157\254\223\056
\174\053\237\236\171\023\221\350\352\236\312\070\165\216\142\260
\225\223\052\345\337\351\136\227\156\040\137\137\204\172\104\071
\031\100\034\272\125\053\373\060\262\201\357\204\343\334\354\230
\070\071\003\205\010\251\124\003\005\051\360\311\217\213\352\013
\206\145\031\021\323\351\011\043\336\150\223\003\311\066\034\041
\156\316\214\146\361\231\060\330\327\263\303\035\370\201\056\250
\275\202\013\146\376\202\313\341\340\032\202\303\100\201\002\003
\001\000\001\243\102\060\100\060\035\006\003\125\035\016\004\026
\004\024\275\210\207\311\217\366\244\012\013\252\353\305\376\221
\043\235\253\112\212\062\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\006\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\003\202\001\001\000\035\174\372\111\217
\064\351\267\046\222\026\232\005\164\347\113\320\155\071\154\303
\046\366\316\270\061\274\304\337\274\052\370\067\221\030\334\004
\310\144\231\053\030\155\200\003\131\311\256\370\130\320\076\355
\303\043\237\151\074\206\070\034\236\357\332\047\170\321\204\067
\161\212\074\113\071\317\176\105\006\326\055\330\212\115\170\022
\326\255\302\323\313\322\320\101\363\046\066\112\233\225\154\014
\356\345\321\103\047\146\301\210\367\172\263\040\154\352\260\151
\053\307\040\350\014\003\304\101\005\231\342\077\344\153\370\240
\206\201\307\204\306\037\325\113\201\022\262\026\041\054\023\241
\200\262\136\014\112\023\236\040\330\142\100\253\220\352\144\112
\057\254\015\001\022\171\105\250\057\207\031\150\310\342\205\307
\060\262\165\371\070\077\262\300\223\264\153\342\003\104\316\147
\240\337\211\326\255\214\166\243\023\303\224\141\053\153\331\154
\301\007\012\042\007\205\154\205\044\106\251\276\077\213\170\204
\202\176\044\014\235\375\201\067\343\045\250\355\066\116\225\054
\311\234\220\332\354\251\102\074\255\266\002

END

#

Trust for Certificate "TUBITAK UEKAE Kok Sertifika Hizmet Saglayicisi - Surum 3"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

```

CKA_LABEL UTF8 "T\x3c3\x9c\x42\xC4\xB0TAK UEKAE K\xC3\xB6k Sertifika Hizmet
Sa\xC4\x9F\lay\x4\xb1\x63\x4\xb1s\x4\xb1 - S\xC3\xBCr\xC3\xBCm 3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\033\113\071\141\046\047\153\144\221\242\150\155\327\002\103\041
\055\037\035\226
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\355\101\365\214\120\305\053\234\163\346\356\154\353\302\250\046
END
CKA_ISSUER MULTILINE_OCTAL
\060\202\001\053\061\013\060\011\006\003\125\004\006\023\002\124
\122\061\030\060\026\006\003\125\004\007\014\017\107\145\142\172
\145\040\055\040\113\157\143\141\145\154\151\061\107\060\105\006
\003\125\004\012\014\076\124\303\274\162\153\151\171\145\040\102
\151\154\151\155\163\145\154\040\166\145\040\124\145\153\156\157
\154\157\152\151\153\040\101\162\141\305\237\164\304\261\162\155
\141\040\113\165\162\165\155\165\040\055\040\124\303\234\102\304
\260\124\101\113\061\110\060\106\006\003\125\004\013\014\077\125
\154\165\163\141\154\040\105\154\145\153\164\162\157\156\151\153
\040\166\145\040\113\162\151\160\164\157\154\157\152\151\040\101
\162\141\305\237\164\304\261\162\155\141\040\105\156\163\164\151
\164\303\274\163\303\274\040\055\040\125\105\113\101\105\061\043
\060\041\006\003\125\004\013\014\032\113\141\155\165\040\123\145
\162\164\151\146\151\153\141\163\171\157\156\040\115\145\162\153
\145\172\151\061\112\060\110\006\003\125\004\003\014\101\124\303
\234\102\304\260\124\101\113\040\125\105\113\101\105\040\113\303
\266\153\040\123\145\162\164\151\146\151\153\141\040\110\151\172
\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304\261
\163\304\261\040\055\040\123\303\274\162\303\274\155\040\063
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\021
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "Buypass Class 2 CA 1"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Buypass Class 2 CA 1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

```

CKA_SUBJECT MULTILINE_OCTAL

\060\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035
\060\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163
\040\103\154\141\163\163\040\062\040\103\101\040\061

END

CKA_ID UTF8 "0"

CKA_ISSUER

MULTILINE_OCTAL

\060\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035
\060\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163
\040\103\154\141\163\163\040\062\040\103\101\040\061

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\001\001

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\123\060\202\002\073\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\000\000\060
\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061\035
\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163\163
\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035\060
\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163\040
\103\154\141\163\163\040\062\040\103\101\040\061\060\036\027\015
\060\066\061\060\061\063\061\060\062\065\060\071\132\027\015\061
\066\061\060\061\063\061\060\062\065\060\071\132\060\113\061\013
\060\011\006\003\125\004\006\023\002\116\117\061\035\060\033\006
\003\125\004\012\014\024\102\165\171\160\141\163\163\040\101\123
\055\071\070\063\061\066\063\063\062\067\061\035\060\033\006\003
\125\004\003\014\024\102\165\171\160\141\163\163\040\103\154\141
\163\163\040\062\040\103\101\040\061\060\202\001\042\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017
\000\060\202\001\012\002\202\001\001\000\213\074\007\105\330\366
\337\346\307\312\272\215\103\305\107\215\260\132\301\070\333\222
\204\034\257\023\324\017\157\066\106\040\304\056\314\161\160\064
\242\064\323\067\056\330\335\072\167\057\300\353\051\350\134\322
\265\251\221\064\207\042\131\376\314\333\347\231\257\226\301\250
\307\100\335\245\025\214\156\310\174\227\003\313\346\040\362\327
\227\137\061\241\057\067\322\276\356\276\251\255\250\114\236\041
\146\103\073\250\274\363\011\243\070\325\131\044\301\302\107\166
\261\210\134\202\073\273\053\246\004\327\214\007\217\315\325\101
\035\360\256\270\051\054\224\122\140\064\224\073\332\340\070\321
\235\063\076\025\364\223\062\305\000\332\265\051\146\016\072\170
\017\041\122\137\002\345\222\173\045\323\222\036\057\025\235\201
\344\235\216\350\357\211\316\024\114\124\035\034\201\022\115\160

```
\250\276\020\005\027\176\037\321\270\127\125\355\315\273\122\302
\260\036\170\302\115\066\150\313\126\046\301\122\301\275\166\367
\130\325\162\176\037\104\166\273\000\211\035\026\235\121\065\357
\115\302\126\357\153\340\214\073\015\351\002\003\001\000\001\243
\102\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\077
\215\232\131\213\374\173\173\234\243\257\070\260\071\355\220\161
\200\326\310\060\016\006\003\125\035\017\001\001\377\004\004\003
\002\001\006\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\003\202\001\001\000\025\032\176\023\212\271\350\007\243
\113\047\062\262\100\221\362\041\321\144\205\276\143\152\322\317
\201\302\025\325\172\176\014\051\254\067\036\034\174\166\122\225
\332\265\177\043\241\051\167\145\311\062\235\250\056\126\253\140
\166\316\026\264\215\177\170\300\325\231\121\203\177\136\331\276
\014\250\120\355\042\307\255\005\114\166\373\355\356\036\107\144
\366\367\047\175\134\050\017\105\305\134\142\136\246\232\221\221
\267\123\027\056\334\255\140\235\226\144\071\275\147\150\262\256
\005\313\115\347\137\037\127\206\325\040\234\050\373\157\023\070
\365\366\021\222\366\175\231\136\037\014\350\253\104\044\051\162
\100\075\066\122\257\214\130\220\163\301\354\141\054\171\241\354
\207\265\077\332\115\331\041\000\060\336\220\332\016\323\032\110
\251\076\205\013\024\213\214\274\101\236\152\367\016\160\300\065
\367\071\242\135\146\320\173\131\237\250\107\022\232\047\043\244
\055\216\047\203\222\040\241\327\025\177\361\056\030\356\364\110
\177\057\177\361\241\030\265\241\013\224\240\142\040\062\234\035
\366\324\357\277\114\210\150
```

END

#

```
Trust for Certificate "Buypass Class 2 CA 1"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN
CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Buypass Class 2 CA 1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\240\241\253\220\311\374\204\173\073\022\141\350\227\175\137\323
\042\141\323\314
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\270\010\232\360\003\314\033\015\310\154\013\166\241\165\144\043
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035
\060\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163
```

```
\040\103\154\141\163\163\040\062\040\103\101\040\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "Buypass Class 3
CA 1"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Buypass Class 3 CA 1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035
\060\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163
\040\103\154\141\163\163\040\063\040\103\101\040\061
```

```
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035
\060\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163
\040\103\154\141\163\163\040\063\040\103\101\040\061
```

```
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\002
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\123\060\202\002\073\240\003\002\001\002\002\001\002
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061\035
\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163\163
\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035\060
\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163\040
\103\154\141\163\163\040\063\040\103\101\040\061\060\036\027\015
\060\065\060\065\060\071\061\064\061\063\060\063\132\027\015\061
\065\060\065\060\071\061\064\061\063\060\063\132\060\113\061\013
```

\060\011\006\003\125\004\006\023\002\116\117\061\035\060\033\006
\003\125\004\012\014\024\102\165\171\160\141\163\163\040\101\123
\055\071\070\063\061\066\063\063\062\067\061\035\060\033\006\003
\125\004\003\014\024\102\165\171\160\141\163\163\040\103\154\141
\163\163\040\063\040\103\101\040\061\060\202\001\042\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017
\000\060\202\001\012\002\202\001\001\000\244\216\327\164\331\051
\144\336\137\037\207\200\221\352\116\071\346\031\306\104\013\200
\325\013\257\123\007\213\022\275\346\147\360\002\261\211\366\140
\212\304\133\260\102\321\300\041\250\313\341\233\357\144\121\266
\247\317\025\365\164\200\150\004\220\240\130\242\346\164\246\123
\123\125\110\143\077\222\126\335\044\116\216\370\272\053\377\363
\064\212\236\050\327\064\237\254\057\326\017\361\244\057\275\122
\262\111\205\155\071\065\360\104\060\223\106\044\363\266\347\123
\373\274\141\257\251\243\024\373\302\027\027\204\154\340\174\210
\370\311\034\127\054\360\075\176\224\274\045\223\204\350\232\000
\232\105\005\102\127\200\364\116\316\331\256\071\366\310\123\020
\014\145\072\107\173\140\302\326\372\221\311\306\161\154\275\221
\207\074\221\206\111\253\363\017\240\154\046\166\136\034\254\233
\161\345\215\274\233\041\036\234\326\070\176\044\200\025\061\202
\226\261\111\323\142\067\133\210\014\012\142\064\376\247\110\176
\231\261\060\213\220\067\225\034\250\037\245\054\215\364\125\310
\333\335\131\012\302\255\170\240\364\213\002\003\001\000\001\243
\102\060\100\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\070
\024\346\310\360\251\244\003\364\116\076\042\243\133\362\326\340
\255\100\164\060\016\006\003\125\035\017\001\001\377\004\004\003
\002\001\006\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\003\202\001\001\000\001\147\243\214\311\045\075\023\143
\135\026\157\354\241\076\011\134\221\025\052\052\331\200\041\117
\005\334\273\245\211\253\023\063\052\236\070\267\214\157\002\162
\143\307\163\167\036\011\006\272\073\050\173\244\107\311\141\153
\010\010\040\374\212\005\212\037\274\272\306\302\376\317\156\354
\023\063\161\147\056\151\372\251\054\077\146\300\022\131\115\013
\124\002\222\204\273\333\022\357\203\160\160\170\310\123\372\337
\306\306\377\334\210\057\007\300\111\235\062\127\140\323\362\366
\231\051\137\347\252\001\314\254\063\250\034\012\273\221\304\003
\240\157\266\064\371\206\323\263\166\124\230\364\112\201\263\123
\235\115\100\354\345\167\023\105\257\133\252\037\330\057\114\202
\173\376\052\304\130\273\117\374\236\375\003\145\032\052\016\303
\245\040\026\224\153\171\246\242\022\264\273\032\244\043\172\137
\360\256\204\044\344\363\053\373\212\044\243\047\230\145\332\060
\165\166\374\031\221\350\333\353\233\077\062\277\100\227\007\046
\272\314\363\224\205\112\172\047\223\317\220\102\324\270\133\026
\246\347\313\100\003\335\171

END

#

```

Trust for Certificate "Buypass Class 3 CA 1"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Buypass Class 3 CA 1"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\141\127\072\021\337\016\330\176\325\222\145\042\352\320\126\327
\104\263\043\161
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\337\074\163\131\201\347\071\120\201\004\114\064\242\313\263\173
END
CKA_ISSUER MULTILINE_OCTAL
\060\113\061\013\060\011\006\003\125\004\006\023\002\116\117\061
\035\060\033\006\003\125\004\012\014\024\102\165\171\160\141\163
\163\040\101\123\055\071\070\063\061\066\063\063\062\067\061\035
\060\033\006\003\125\004\003\014\024\102\165\171\160\141\163\163
\040\103\154\141\163\163\040\063\040\103\101\040\061
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\002
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "EBG Elektronik Sertifika Hizmet Saglayicisi"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "EBG Elektronik Sertifika Hizmet Sa\xC4\x9Flay\xC4\xB1\x63\xC4\xB1s\xC4\xB1"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\200\061\070\060\066\006\003\125\004\003\014\057\105\102
\107\040\105\154\145\153\164\162\157\156\151\153\040\123\145\162
\164\151\146\151\153\141\040\110\151\172\155\145\164\040\123\141
\304\237\154\141\171\304\261\143\304\261\163\304\261\061\067\060
\065\006\003\125\004\012\014\056\105\102\107\040\102\151\154\151
\305\237\151\155\040\124\145\153\156\157\154\157\152\151\154\145
\162\151\040\166\145\040\110\151\172\155\145\164\154\145\162\151
\040\101\056\305\236\056\061\013\060\011\006\003\125\004\006\023
\002\124\122

```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\200\061\070\060\066\006\003\125\004\003\014\057\105\102
\107\040\105\154\145\153\164\162\157\156\151\153\040\123\145\162
\164\151\146\151\153\141\040\110\151\172\155\145\164\040\123\141
\304\237\154\141\171\304\261\143\304\261\163\304\261\061\067\060
\065\006\003\125\004\012\014\056\105\102\107\040\102\151\154\151
\305\237\151\155\040\124\145\153\156\157\154\157\152\151\154\145
\162\151\040\166\145\040\110\151\172\155\145\164\154\145\162\151
\040\101\056\305\236\056\061\013\060\011\006\003\125\004\006\023
\002\124\122

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\010\114\257\163\102\034\216\164\002

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\347\060\202\003\317\240\003\002\001\002\002\010\114
\257\163\102\034\216\164\002\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\060\201\200\061\070\060\066\006\003\125
\004\003\014\057\105\102\107\040\105\154\145\153\164\162\157\156
\151\153\040\123\145\162\164\151\146\151\153\141\040\110\151\172
\155\145\164\040\123\141\304\237\154\141\171\304\261\143\304\261
\163\304\261\061\067\060\065\006\003\125\004\012\014\056\105\102
\107\040\102\151\154\151\305\237\151\155\040\124\145\153\156\157
\154\157\152\151\154\145\162\151\040\166\145\040\110\151\172\155
\145\164\154\145\162\151\040\101\056\305\236\056\061\013\060\011
\006\003\125\004\006\023\002\124\122\060\036\027\015\060\066\060
\070\061\067\060\060\062\061\060\071\132\027\015\061\066\060\070
\061\064\060\060\063\061\060\071\132\060\201\200\061\070\060\066
\006\003\125\004\003\014\057\105\102\107\040\105\154\145\153\164
\162\157\156\151\153\040\123\145\162\164\151\146\151\153\141\040
\110\151\172\155\145\164\040\123\141\304\237\154\141\171\304\261
\143\304\261\163\304\261\061\067\060\065\006\003\125\004\012\014
\056\105\102\107\040\102\151\154\151\305\237\151\155\040\124\145
\153\156\157\154\157\152\151\154\145\162\151\040\166\145\040\110
\151\172\155\145\164\154\145\162\151\040\101\056\305\236\056\061
\013\060\011\006\003\125\004\006\023\002\124\122\060\202\002\042
\060\015\006\011\052\206\110\206\367\015\001\001\001\005\000\003
\202\002\017\000\060\202\002\012\002\202\002\001\000\356\240\204
\141\320\072\152\146\020\062\330\061\070\177\247\247\345\375\241
\341\373\227\167\270\161\226\350\023\226\106\203\117\266\362\137
\162\126\156\023\140\245\001\221\342\133\305\315\127\037\167\143
\121\377\057\075\333\271\077\252\251\065\347\171\320\365\320\044
\266\041\352\353\043\224\376\051\277\373\211\221\014\144\232\005
\112\053\314\014\356\361\075\233\202\151\244\114\370\232\157\347

\042\332\020\272\137\222\374\030\047\012\250\252\104\372\056\054
\264\373\106\232\010\003\203\162\253\210\344\152\162\311\345\145
\037\156\052\017\235\263\350\073\344\014\156\172\332\127\375\327
\353\171\213\136\040\006\323\166\013\154\002\225\243\226\344\313
\166\121\321\050\235\241\032\374\104\242\115\314\172\166\250\015
\075\277\027\117\042\210\120\375\256\266\354\220\120\112\133\237
\225\101\252\312\017\262\112\376\200\231\116\243\106\025\253\370
\163\102\152\302\146\166\261\012\046\025\335\223\222\354\333\251
\137\124\042\122\221\160\135\023\352\110\354\156\003\154\331\335
\154\374\353\015\003\377\246\203\022\233\361\251\223\017\305\046
\114\061\262\143\231\141\162\347\052\144\231\322\270\351\165\342
\174\251\251\232\032\252\303\126\333\020\232\074\203\122\266\173
\226\267\254\207\167\250\271\362\147\013\224\103\263\257\076\163
\372\102\066\261\045\305\012\061\046\067\126\147\272\243\013\175
\326\367\211\315\147\241\267\072\036\146\117\366\240\125\024\045
\114\054\063\015\246\101\214\275\004\061\152\020\162\012\235\016
\056\166\275\136\363\121\211\213\250\077\125\163\277\333\072\306
\044\005\226\222\110\252\113\215\052\003\345\127\221\020\364\152
\050\025\156\107\167\204\134\121\164\237\031\351\346\036\143\026
\071\343\021\025\343\130\032\104\275\313\304\154\146\327\204\006
\337\060\364\067\242\103\042\171\322\020\154\337\273\346\023\021
\374\235\204\012\023\173\360\073\320\374\243\012\327\211\352\226
\176\215\110\205\036\144\137\333\124\242\254\325\172\002\171\153
\322\212\360\147\332\145\162\015\024\160\344\351\216\170\217\062
\164\174\127\362\326\326\364\066\211\033\370\051\154\213\271\366
\227\321\244\056\252\276\013\031\302\105\351\160\135\002\003\000
\235\331\243\143\060\141\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\016\006\003\125\035\017\001\001
\377\004\004\003\002\001\006\060\035\006\003\125\035\016\004\026
\004\024\347\316\306\117\374\026\147\226\372\112\243\007\301\004
\247\313\152\336\332\107\060\037\006\003\125\035\043\004\030\060
\026\200\024\347\316\306\117\374\026\147\226\372\112\243\007\301
\004\247\313\152\336\332\107\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\003\202\002\001\000\233\230\232\135\276
\363\050\043\166\306\154\367\177\346\100\236\300\066\334\225\015
\035\255\025\305\066\330\325\071\357\362\036\042\136\263\202\264
\135\273\114\032\312\222\015\337\107\044\036\263\044\332\221\210
\351\203\160\335\223\327\351\272\263\337\026\132\076\336\340\310
\373\323\375\154\051\370\025\106\240\150\046\314\223\122\256\202
\001\223\220\312\167\312\115\111\357\342\132\331\052\275\060\316
\114\262\201\266\060\316\131\117\332\131\035\152\172\244\105\260
\202\046\201\206\166\365\365\020\000\270\356\263\011\350\117\207
\002\007\256\044\134\360\137\254\012\060\314\212\100\240\163\004
\301\373\211\044\366\232\034\134\267\074\012\147\066\005\010\061
\263\257\330\001\150\052\340\170\217\164\336\270\121\244\214\154
\040\075\242\373\263\324\011\375\173\302\200\252\223\154\051\230
\041\250\273\026\363\251\022\137\164\265\207\230\362\225\046\337
\064\357\212\123\221\210\135\032\224\243\077\174\042\370\327\210

```
\272\246\214\226\250\075\122\064\142\237\000\036\124\125\102\147
\306\115\106\217\273\024\105\075\012\226\026\216\020\241\227\231
\325\323\060\205\314\336\264\162\267\274\212\074\030\051\150\375
\334\161\007\356\044\071\152\372\355\245\254\070\057\371\036\020
\016\006\161\032\020\114\376\165\176\377\036\127\071\102\312\327
\341\025\241\126\125\131\033\321\243\257\021\330\116\303\245\053
\357\220\277\300\354\202\023\133\215\326\162\054\223\116\217\152
\051\337\205\074\323\015\340\242\030\022\314\125\057\107\267\247
\233\002\376\101\366\210\114\155\332\251\001\107\203\144\047\142
\020\202\326\022\173\136\003\037\064\251\311\221\376\257\135\155
\206\047\267\043\252\165\030\312\040\347\260\017\327\211\016\246
\147\042\143\364\203\101\053\006\113\273\130\325\321\327\267\271
\020\143\330\211\112\264\252\335\026\143\365\156\276\140\241\370
\355\350\326\220\117\032\306\305\240\051\323\247\041\250\365\132
\074\367\307\111\242\041\232\112\225\122\040\226\162\232\146\313
\367\322\206\103\174\042\276\226\371\275\001\250\107\335\345\073
\100\371\165\053\233\053\106\144\206\215\036\364\217\373\007\167
\320\352\111\242\034\215\122\024\246\012\223
```

END

#

```
Trust for Certificate "EBG Elektronik Sertifika Hizmet Saglayicisi"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "EBG Elektronik Sertifika Hizmet Sa\xC4\x9Flay\xc4\xb1\x63\xc4\xb1s\xc4\xb1"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\214\226\272\353\335\053\007\007\110\356\060\062\146\240\363\230
\156\174\256\130
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\054\040\046\235\313\032\112\000\205\265\267\132\256\302\001\067
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\200\061\070\060\066\006\003\125\004\003\014\057\105\102
\107\040\105\154\145\153\164\162\157\156\151\153\040\123\145\162
\164\151\146\151\153\141\040\110\151\172\155\145\164\040\123\141
\304\237\154\141\171\304\261\143\304\261\163\304\261\061\067\060
\065\006\003\125\004\012\014\056\105\102\107\040\102\151\154\151
\305\237\151\155\040\124\145\153\156\157\154\157\152\151\154\145
\162\151\040\166\145\040\110\151\172\155\145\164\154\145\162\151
\040\101\056\305\236\056\061\013\060\011\006\003\125\004\006\023
\002\124\122
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\010\114\257\163\102\034\216\164\002
```

```
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "certSIGN ROOT CA"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "certSIGN ROOT CA"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117\061
\021\060\017\006\003\125\004\012\023\010\143\145\162\164\123\111
\107\116\061\031\060\027\006\003\125\004\013\023\020\143\145\162
\164\123\111\107\116\040\122\117\117\124\040\103\101
```

```
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117\061
\021\060\017\006\003\125\004\012\023\010\143\145\162\164\123\111
\107\116\061\031\060\027\006\003\125\004\013\023\020\143\145\162
\164\123\111\107\116\040\122\117\117\124\040\103\101
```

```
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\006\040\006\005\026\160\002
```

```
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\070\060\202\002\040\240\003\002\001\002\002\006\040
\006\005\026\160\002\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\060\073\061\013\060\011\006\003\125\004\006\023
\002\122\117\061\021\060\017\006\003\125\004\012\023\010\143\145
\162\164\123\111\107\116\061\031\060\027\006\003\125\004\013\023
\020\143\145\162\164\123\111\107\116\040\122\117\117\124\040\103
\101\060\036\027\015\060\066\060\067\060\064\061\067\062\060\060
\064\132\027\015\063\061\060\067\060\064\061\067\062\060\060\064
\132\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117
\061\021\060\017\006\003\125\004\012\023\010\143\145\162\164\123
\111\107\116\061\031\060\027\006\003\125\004\013\023\020\143\145
\162\164\123\111\107\116\040\122\117\117\124\040\103\101\060\202
\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000\267
\063\271\176\310\045\112\216\265\333\264\050\033\252\127\220\350
```

\321\042\323\144\272\323\223\350\324\254\206\141\100\152\140\127
\150\124\204\115\274\152\124\002\005\377\337\233\232\052\256\135
\007\217\112\303\050\177\357\373\053\372\171\361\307\255\360\020
\123\044\220\213\146\311\250\210\253\257\132\243\000\351\276\272
\106\356\133\163\173\054\027\202\201\136\142\054\241\002\145\263
\275\305\053\000\176\304\374\003\063\127\015\355\342\372\316\135
\105\326\070\315\065\266\262\301\320\234\201\112\252\344\262\001
\134\035\217\137\231\304\261\255\333\210\041\353\220\010\202\200
\363\060\243\103\346\220\202\256\125\050\111\355\133\327\251\020
\070\016\376\217\114\133\233\106\352\101\365\260\010\164\303\320
\210\063\266\174\327\164\337\334\204\321\103\016\165\071\241\045
\100\050\352\170\313\016\054\056\071\235\214\213\156\026\034\057
\046\202\020\342\343\145\224\012\004\300\136\367\135\133\370\020
\342\320\272\172\113\373\336\067\000\000\032\133\050\343\322\234
\163\076\062\207\230\241\311\121\057\327\336\254\063\263\117\002
\003\001\000\001\243\102\060\100\060\017\006\003\125\035\023\001
\001\377\004\005\060\003\001\001\377\060\016\006\003\125\035\017
\001\001\377\004\004\003\002\001\306\060\035\006\003\125\035\016
\004\026\004\024\340\214\233\333\045\111\263\361\174\206\326\262
\102\207\013\320\153\240\331\344\060\015\006\011\052\206\110\206
\367\015\001\001\005\005\000\003\202\001\001\000\076\322\034\211
\056\065\374\370\165\335\346\177\145\210\364\162\114\311\054\327
\062\116\363\335\031\171\107\275\216\073\133\223\017\120\111\044
\023\153\024\006\162\357\011\323\241\241\343\100\204\311\347\030
\062\164\074\110\156\017\237\113\324\367\036\323\223\206\144\124
\227\143\162\120\325\125\317\372\040\223\002\242\233\303\043\223
\116\026\125\166\240\160\171\155\315\041\037\317\057\055\274\031
\343\210\061\370\131\032\201\011\310\227\246\164\307\140\304\133
\314\127\216\262\165\375\033\002\011\333\131\157\162\223\151\367
\061\101\326\210\070\277\207\262\275\026\171\371\252\344\276\210
\045\335\141\047\043\034\265\061\007\004\066\264\032\220\275\240
\164\161\120\211\155\274\024\343\017\206\256\361\253\076\307\240
\011\314\243\110\321\340\333\144\347\222\265\317\257\162\103\160
\213\371\303\204\074\023\252\176\222\233\127\123\223\372\160\302
\221\016\061\371\233\147\135\351\226\070\136\137\263\163\116\210
\025\147\336\236\166\020\142\040\276\125\151\225\103\000\071\115
\366\356\260\132\116\111\104\124\130\137\102\203

END

#

Trust for Certificate "certSIGN ROOT CA"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "certSIGN ROOT CA"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\372\267\356\066\227\046\142\373\055\260\052\366\277\003\375\350

```

\174\113\057\233
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\030\230\300\326\351\072\374\371\260\365\014\367\113\001\104\027
END
CKA_ISSUER MULTILINE_OCTAL
\060\073\061\013\060\011\006\003\125\004\006\023\002\122\117\061
\021\060\017\006\003\125\004\012\023\010\143\145\162\164\123\111
\107\116\061\031\060\027\006\003\125\004\013\023\020\143\145\162
\164\123\111\107\116\040\122\117\117\124\040\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\006\040\006\005\026\160\002
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED
CK_BBOOL CK_FALSE

#
# Certificate "CNNIC ROOT"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "CNNIC ROOT"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\062\061\013\060\011\006\003\125\004\006\023\002\103\116\061
\016\060\014\006\003\125\004\012\023\005\103\116\116\111\103\061
\023\060\021\006\003\125\004\003\023\012\103\116\116\111\103\040
\122\117\117\124
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\062\061\013\060\011\006\003\125\004\006\023\002\103\116\061
\016\060\014\006\003\125\004\012\023\005\103\116\116\111\103\061
\023\060\021\006\003\125\004\003\023\012\103\116\116\111\103\040
\122\117\117\124
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\004\111\063\000\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\125\060\202\002\075\240\003\002\001\002\002\004\111
\063\000\001\060\015\006\011\052\206\110\206\367\015\001\001\005

```

\005\000\060\062\061\013\060\011\006\003\125\004\006\023\002\103
\116\061\016\060\014\006\003\125\004\012\023\005\103\116\116\111
\103\061\023\060\021\006\003\125\004\003\023\012\103\116\116\111
\103\040\122\117\117\124\060\036\027\015\060\067\060\064\061\066
\060\067\060\071\061\064\132\027\015\062\067\060\064\061\066\060
\067\060\071\061\064\132\060\062\061\013\060\011\006\003\125\004
\006\023\002\103\116\061\016\060\014\006\003\125\004\012\023\005
\103\116\116\111\103\061\023\060\021\006\003\125\004\003\023\012
\103\116\116\111\103\040\122\117\117\124\060\202\001\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001
\017\000\060\202\001\012\002\202\001\001\000\323\065\367\077\163
\167\255\350\133\163\027\302\321\157\355\125\274\156\352\350\244
\171\262\154\303\243\357\341\237\261\073\110\205\365\232\134\041
\042\020\054\305\202\316\332\343\232\156\067\341\207\054\334\271
\014\132\272\210\125\337\375\252\333\037\061\352\001\361\337\071
\001\301\023\375\110\122\041\304\125\337\332\330\263\124\166\272
\164\261\267\175\327\300\350\366\131\305\115\310\275\255\037\024
\332\337\130\104\045\062\031\052\307\176\176\216\256\070\260\060
\173\107\162\011\061\360\060\333\303\033\166\051\273\151\166\116
\127\371\033\144\242\223\126\267\157\231\156\333\012\004\234\021
\343\200\037\313\143\224\020\012\251\341\144\202\061\371\214\047
\355\246\231\000\366\160\223\030\370\241\064\206\243\335\172\302
\030\171\366\172\145\065\317\220\353\275\063\223\237\123\253\163
\073\346\233\064\040\057\035\357\251\035\143\032\240\200\333\003
\057\371\046\032\206\322\215\273\251\276\122\072\207\147\110\015
\277\264\240\330\046\276\043\137\163\067\177\046\346\222\004\243
\177\317\040\247\267\363\072\312\313\231\313\002\003\001\000\001
\243\163\060\161\060\021\006\011\140\206\110\001\206\370\102\001
\001\004\004\003\002\000\007\060\037\006\003\125\035\043\004\030
\060\026\200\024\145\362\061\255\052\367\367\335\122\226\012\307
\002\301\016\357\246\325\073\021\060\017\006\003\125\035\023\001
\001\377\004\005\060\003\001\001\377\060\013\006\003\125\035\017
\004\004\003\002\001\376\060\035\006\003\125\035\016\004\026\004
\024\145\362\061\255\052\367\367\335\122\226\012\307\002\301\016
\357\246\325\073\021\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\003\202\001\001\000\113\065\356\314\344\256\277
\303\156\255\237\225\073\113\077\133\036\337\127\051\242\131\312
\070\342\271\032\377\236\346\156\062\335\036\256\352\065\267\365
\223\221\116\332\102\341\303\027\140\120\362\321\134\046\271\202
\267\352\155\344\234\204\347\003\171\027\257\230\075\224\333\307
\272\000\347\270\277\001\127\301\167\105\062\014\073\361\264\034
\010\260\375\121\240\241\335\232\035\023\066\232\155\267\307\074
\271\341\305\331\027\372\203\325\075\025\240\074\273\036\013\342
\310\220\077\250\206\014\374\371\213\136\205\313\117\133\113\142
\021\107\305\105\174\005\057\101\261\236\020\151\033\231\226\340
\125\171\373\116\206\231\270\224\332\206\070\152\223\243\347\313
\156\345\337\352\041\125\211\234\175\175\177\230\365\000\211\356
\343\204\300\134\226\265\305\106\352\106\340\205\125\266\033\311

```
\022\326\301\315\315\200\363\002\001\074\310\151\313\105\110\143
\330\224\320\354\205\016\073\116\021\145\364\202\214\246\075\256
\056\042\224\011\310\134\352\074\201\135\026\052\003\227\026\125
\011\333\212\101\202\236\146\233\021
END
```

```
#
```

```
Trust for Certificate "CNNIC ROOT"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "CNNIC ROOT"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\213\257\114\233\035\360\052\222\367\332\022\216\271\033\254\364
\230\140\113\157
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\041\274\202\253\111\304\023\073\113\262\053\134\153\220\234\031
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\062\061\013\060\011\006\003\125\004\006\023\002\103\116\061
\016\060\014\006\003\125\004\012\023\005\103\116\116\111\103\061
\023\060\021\006\003\125\004\003\023\012\103\116\116\111\103\040
\122\117\117\124
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\111\063\000\001
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "ApplicationCA - Japanese Government"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "ApplicationCA - Japanese Government"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\103\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\034\060\032\006\003\125\004\012\023\023\112\141\160\141\156\145
\163\145\040\107\157\166\145\162\156\155\145\156\164\061\026\060
```

```
\024\006\003\125\004\013\023\015\101\160\160\154\151\143\141\164
\151\157\156\103\101
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\103\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\034\060\032\006\003\125\004\012\023\023\112\141\160\141\156\145
\163\145\040\107\157\166\145\162\156\155\145\156\164\061\026\060
\024\006\003\125\004\013\023\015\101\160\160\154\151\143\141\164
\151\157\156\103\101
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\061
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\240\060\202\002\210\240\003\002\001\002\002\001\061
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\103\061\013\060\011\006\003\125\004\006\023\002\112\120\061\034
\060\032\006\003\125\004\012\023\023\112\141\160\141\156\145\163
\145\040\107\157\166\145\162\156\155\145\156\164\061\026\060\024
\006\003\125\004\013\023\015\101\160\160\154\151\143\141\164\151
\157\156\103\101\060\036\027\015\060\067\061\062\061\062\061\065
\060\060\060\060\132\027\015\061\067\061\062\061\062\061\065\060
\060\060\060\132\060\103\061\013\060\011\006\003\125\004\006\023
\002\112\120\061\034\060\032\006\003\125\004\012\023\023\112\141
\160\141\156\145\163\145\040\107\157\166\145\162\156\155\145\156
\164\061\026\060\024\006\003\125\004\013\023\015\101\160\160\154
\151\143\141\164\151\157\156\103\101\060\202\001\042\060\015\006
\011\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017
\000\060\202\001\012\002\202\001\001\000\247\155\340\164\116\207
\217\245\006\336\150\242\333\206\231\113\144\015\161\360\012\005
\233\216\252\341\314\056\322\152\073\301\172\264\227\141\215\212
\276\306\232\234\006\264\206\121\344\067\016\164\170\176\137\212
\177\224\244\327\107\010\375\120\132\126\344\150\254\050\163\240
\173\351\177\030\222\100\117\055\235\365\256\104\110\163\066\006
\236\144\054\073\064\043\333\134\046\344\161\171\217\324\156\171
\042\271\223\301\312\315\301\126\355\210\152\327\240\071\041\004
\127\054\242\365\274\107\101\117\136\064\042\225\265\037\051\155
\136\112\363\115\162\276\101\126\040\207\374\351\120\107\327\060
\024\356\134\214\125\272\131\215\207\374\043\336\223\320\004\214
\375\357\155\275\320\172\311\245\072\152\162\063\306\112\015\005
\027\052\055\173\261\247\330\326\360\276\364\077\352\016\050\155
\101\141\043\166\170\303\270\145\244\363\132\256\314\302\252\331
\347\130\336\266\176\235\205\156\237\052\012\157\237\003\051\060
\227\050\035\274\267\317\124\051\116\121\061\371\047\266\050\046
\376\242\143\346\101\026\360\063\230\107\002\003\001\000\001\243
\201\236\060\201\233\060\035\006\003\125\035\016\004\026\004\024
```


\124\132\313\046\077\161\314\224\106\015\226\123\352\153\110\320
\223\376\102\165\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\006\060\131\006\003\125\035\021\004\122\060\120\244
\116\060\114\061\013\060\011\006\003\125\004\006\023\002\112\120
\061\030\060\026\006\003\125\004\012\014\017\346\227\245\346\234
\254\345\233\275\346\224\277\345\272\234\061\043\060\041\006\003
\125\004\013\014\032\343\202\242\343\203\227\343\203\252\343\202
\261\343\203\274\343\202\267\343\203\247\343\203\263\103\101\060
\017\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\071\152\104\166\167\070\072\354\243\147\106\017
\371\213\006\250\373\152\220\061\316\176\354\332\321\211\174\172
\353\056\014\275\231\062\347\260\044\326\303\377\365\262\210\011
\207\054\343\124\341\243\246\262\010\013\300\205\250\310\322\234
\161\366\035\237\140\374\070\063\023\341\236\334\013\137\332\026
\120\051\173\057\160\221\017\231\272\064\064\215\225\164\305\176
\170\251\146\135\275\312\041\167\102\020\254\146\046\075\336\221
\253\375\025\360\157\355\154\137\020\370\363\026\366\003\212\217
\247\022\021\014\313\375\077\171\301\234\375\142\356\243\317\124
\014\321\053\137\027\076\343\076\277\300\053\076\011\233\376\210
\246\176\264\222\027\374\043\224\201\275\156\247\305\214\302\353
\021\105\333\370\101\311\226\166\352\160\137\171\022\153\344\243
\007\132\005\357\047\111\317\041\237\212\114\011\160\146\251\046
\301\053\021\116\063\322\016\374\326\154\322\016\062\144\150\377
\255\005\170\137\003\035\250\343\220\254\044\340\017\100\247\113
\256\213\050\267\202\312\030\007\346\267\133\164\351\040\031\177
\262\033\211\124

END

#

Trust for Certificate "ApplicationCA - Japanese Government"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "ApplicationCA - Japanese Government"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\177\212\260\317\320\121\207\152\146\363\066\017\107\310\215\214
\323\065\374\164

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\176\043\116\133\247\245\264\045\351\000\007\164\021\142\256\326

END

CKA_ISSUER MULTILINE_OCTAL

\060\103\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\034\060\032\006\003\125\004\012\023\023\112\141\160\141\156\145
\163\145\040\107\157\166\145\162\156\155\145\156\164\061\026\060
\024\006\003\125\004\013\023\015\101\160\160\154\151\143\141\164

```
\151\157\156\103\101
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\061
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION
CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "GeoTrust Primary Certification Authority - G3"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Primary Certification Authority - G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162
\165\163\164\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\050\143\051\040\062\060\060\070\040\107\145\157\124
\162\165\163\164\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\066\060\064\006\003\125\004\003\023\055\107\145
\157\124\162\165\163\164\040\120\162\151\155\141\162\171\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\040\055\040\107\063
END
```

```
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162
\165\163\164\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\050\143\051\040\062\060\060\070\040\107\145\157\124
\162\165\163\164\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\066\060\064\006\003\125\004\003\023\055\107\145
\157\124\162\165\163\164\040\120\162\151\155\141\162\171\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\040\055\040\107\063
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\025\254\156\224\031\262\171\113\101\366\047\251\303\030
```

\017\037

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\376\060\202\002\346\240\003\002\001\002\002\020\025
\254\156\224\031\262\171\113\101\366\047\251\303\030\017\037\060
\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\201
\230\061\013\060\011\006\003\125\004\006\023\002\125\123\061\026
\060\024\006\003\125\004\012\023\015\107\145\157\124\162\165\163
\164\040\111\156\143\056\061\071\060\067\006\003\125\004\013\023
\060\050\143\051\040\062\060\060\070\040\107\145\157\124\162\165
\163\164\040\111\156\143\056\040\055\040\106\157\162\040\141\165
\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154
\171\061\066\060\064\006\003\125\004\003\023\055\107\145\157\124
\162\165\163\164\040\120\162\151\155\141\162\171\040\103\145\162
\164\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157
\162\151\164\171\040\055\040\107\063\060\036\027\015\060\070\060
\064\060\062\060\060\060\060\060\060\132\027\015\063\067\061\062
\060\061\062\063\065\071\065\071\132\060\201\230\061\013\060\011
\006\003\125\004\006\023\002\125\123\061\026\060\024\006\003\125
\004\012\023\015\107\145\157\124\162\165\163\164\040\111\156\143
\056\061\071\060\067\006\003\125\004\013\023\060\050\143\051\040
\062\060\060\070\040\107\145\157\124\162\165\163\164\040\111\156
\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151
\172\145\144\040\165\163\145\040\157\156\154\171\061\066\060\064
\006\003\125\004\003\023\055\107\145\157\124\162\165\163\164\040
\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151\143
\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171\040
\055\040\107\063\060\202\001\042\060\015\006\011\052\206\110\206
\367\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012
\002\202\001\001\000\334\342\136\142\130\035\063\127\071\062\063
\372\353\313\207\214\247\324\112\335\006\210\352\144\216\061\230
\245\070\220\036\230\317\056\143\053\360\106\274\104\262\211\241
\300\050\014\111\160\041\225\237\144\300\246\223\022\002\145\046
\206\306\245\211\360\372\327\204\240\160\257\117\032\227\077\006
\104\325\311\353\162\020\175\344\061\050\373\034\141\346\050\007
\104\163\222\042\151\247\003\210\154\235\143\310\122\332\230\047
\347\010\114\160\076\264\311\022\301\305\147\203\135\063\363\003
\021\354\152\320\123\342\321\272\066\140\224\200\273\141\143\154
\133\027\176\337\100\224\036\253\015\302\041\050\160\210\377\326
\046\154\154\140\004\045\116\125\176\175\357\277\224\110\336\267
\035\335\160\215\005\137\210\245\233\362\302\356\352\321\100\101
\155\142\070\035\126\006\305\003\107\121\040\031\374\173\020\013
\016\142\256\166\125\277\137\167\276\076\111\001\123\075\230\045
\003\166\044\132\035\264\333\211\352\171\345\266\263\073\077\272
\114\050\101\177\006\254\152\216\301\320\366\005\035\175\346\102
\206\343\245\325\107\002\003\001\000\001\243\102\060\100\060\017
\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060
\016\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060

```
\035\006\003\125\035\016\004\026\004\024\304\171\312\216\241\116
\003\035\034\334\153\333\061\133\224\076\077\060\177\055\060\015
\006\011\052\206\110\206\367\015\001\001\013\005\000\003\202\001
\001\000\055\305\023\317\126\200\173\172\170\275\237\256\054\231
\347\357\332\337\224\136\011\151\247\347\156\150\214\275\162\276
\107\251\016\227\022\270\112\361\144\323\071\337\045\064\324\301
\315\116\201\360\017\004\304\044\263\064\226\306\246\252\060\337
\150\141\163\327\371\216\205\211\357\016\136\225\050\112\052\047
\217\020\216\056\174\206\304\002\236\332\014\167\145\016\104\015
\222\375\375\263\026\066\372\021\015\035\214\016\007\211\152\051
\126\367\162\364\335\025\234\167\065\146\127\253\023\123\330\216
\301\100\305\327\023\026\132\162\307\267\151\001\304\172\261\203
\001\150\175\215\101\241\224\030\301\045\134\374\360\376\203\002
\207\174\015\015\317\056\010\134\112\100\015\076\354\201\141\346
\044\333\312\340\016\055\007\262\076\126\334\215\365\101\205\007
\110\233\014\013\313\111\077\175\354\267\375\313\215\147\211\032
\253\355\273\036\243\000\010\010\027\052\202\134\061\135\106\212
\055\017\206\233\164\331\105\373\324\100\261\172\252\150\055\206
\262\231\042\341\301\053\307\234\370\363\137\250\202\022\353\031
\021\055
```

END

#

```
Trust for Certificate "GeoTrust Primary Certification Authority - G3"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Primary Certification Authority - G3"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\003\236\355\270\013\347\240\074\151\123\211\073\040\322\331\062
\072\114\052\375
```

END

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\265\350\064\066\311\020\104\130\110\160\155\056\203\324\270\005
```

END

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162
\165\163\164\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\050\143\051\040\062\060\060\070\040\107\145\157\124
\162\165\163\164\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\066\060\064\006\003\125\004\003\023\055\107\145
\157\124\162\165\163\164\040\120\162\151\155\141\162\171\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\040\055\040\107\063
```

END

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\025\254\156\224\031\262\171\113\101\366\047\251\303\030
\017\037
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
# Certificate "thawte Primary Root CA - G2"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "thawte Primary Root CA - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\204\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\070\060\066\006\003\125\004\013
\023\057\050\143\051\040\062\060\060\067\040\164\150\141\167\164
\145\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165
\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154
\171\061\044\060\042\006\003\125\004\003\023\033\164\150\141\167
\164\145\040\120\162\151\155\141\162\171\040\122\157\157\164\040
\103\101\040\055\040\107\062
END
```

```
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\201\204\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\070\060\066\006\003\125\004\013
\023\057\050\143\051\040\062\060\060\067\040\164\150\141\167\164
\145\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165
\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154
\171\061\044\060\042\006\003\125\004\003\023\033\164\150\141\167
\164\145\040\120\162\151\155\141\162\171\040\122\157\157\164\040
\103\101\040\055\040\107\062
END
```

```
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\065\374\046\134\331\204\117\311\075\046\075\127\233\256
\327\126
END
```

CKA_VALUE MULTILINE_OCTAL

\060\202\002\210\060\202\002\015\240\003\002\001\002\002\020\065
\374\046\134\331\204\117\311\075\046\075\127\233\256\327\126\060
\012\006\010\052\206\110\316\075\004\003\003\060\201\204\061\013
\060\011\006\003\125\004\006\023\002\125\123\061\025\060\023\006
\003\125\004\012\023\014\164\150\141\167\164\145\054\040\111\156
\143\056\061\070\060\066\006\003\125\004\013\023\057\050\143\051
\040\062\060\060\067\040\164\150\141\167\164\145\054\040\111\156
\143\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151
\172\145\144\040\165\163\145\040\157\156\154\171\061\044\060\042
\006\003\125\004\003\023\033\164\150\141\167\164\145\040\120\162
\151\155\141\162\171\040\122\157\157\164\040\103\101\040\055\040
\107\062\060\036\027\015\060\067\061\061\060\065\060\060\060\060
\060\060\132\027\015\063\070\060\061\061\070\062\063\065\071\065
\071\132\060\201\204\061\013\060\011\006\003\125\004\006\023\002
\125\123\061\025\060\023\006\003\125\004\012\023\014\164\150\141
\167\164\145\054\040\111\156\143\056\061\070\060\066\006\003\125
\004\013\023\057\050\143\051\040\062\060\060\067\040\164\150\141
\167\164\145\054\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\044\060\042\006\003\125\004\003\023\033\164\150
\141\167\164\145\040\120\162\151\155\141\162\171\040\122\157\157
\164\040\103\101\040\055\040\107\062\060\166\060\020\006\007\052
\206\110\316\075\002\001\006\005\053\201\004\000\042\003\142\000
\004\242\325\234\202\173\225\235\361\122\170\207\376\212\026\277
\005\346\337\243\002\117\015\007\306\000\121\272\014\002\122\055
\042\244\102\071\304\376\217\352\311\301\276\324\115\377\237\172
\236\342\261\174\232\255\247\206\011\163\207\321\347\232\343\172
\245\252\156\373\272\263\160\300\147\210\242\065\324\243\232\261
\375\255\302\357\061\372\250\271\363\373\010\306\221\321\373\051
\225\243\102\060\100\060\017\006\003\125\035\023\001\001\377\004
\005\060\003\001\001\377\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\006\060\035\006\003\125\035\016\004\026\004
\024\232\330\000\060\000\347\153\177\205\030\356\213\266\316\212
\014\370\021\341\273\060\012\006\010\052\206\110\316\075\004\003
\003\003\151\000\060\146\002\061\000\335\370\340\127\107\133\247
\346\012\303\275\365\200\212\227\065\015\033\211\074\124\206\167
\050\312\241\364\171\336\265\346\070\260\360\145\160\214\177\002
\124\302\277\377\330\241\076\331\317\002\061\000\304\215\224\374
\334\123\322\334\235\170\026\037\025\063\043\123\122\343\132\061
\135\235\312\256\275\023\051\104\015\047\133\250\347\150\234\022
\367\130\077\056\162\002\127\243\217\241\024\056

END

#

Trust for Certificate "thawte Primary Root CA - G2"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN

```

CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "thawte Primary Root CA - G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\252\333\274\042\043\217\304\001\241\047\273\070\335\364\035\333
\010\236\360\022
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\164\235\352\140\044\304\375\042\123\076\314\072\162\331\051\117
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\204\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\070\060\066\006\003\125\004\013
\023\057\050\143\051\040\062\060\060\067\040\164\150\141\167\164
\145\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165
\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154
\171\061\044\060\042\006\003\125\004\003\023\033\164\150\141\167
\164\145\040\120\162\151\155\141\162\171\040\122\157\157\164\040
\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\020\065\374\046\134\331\204\117\311\075\046\075\127\233\256
\327\126
END
CKA_TRUST_SERVER_AUTH
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "thawte Primary Root CA - G3"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "thawte Primary Root CA - G3"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\070\060\066\006\003\125\004\013\023\057\050\143\051\040

```

\062\060\060\070\040\164\150\141\167\164\145\054\040\111\156\143
\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172
\145\144\040\165\163\145\040\157\156\154\171\061\044\060\042\006
\003\125\004\003\023\033\164\150\141\167\164\145\040\120\162\151
\155\141\162\171\040\122\157\157\164\040\103\101\040\055\040\107
\063

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\070\060\066\006\003\125\004\013\023\057\050\143\051\040
\062\060\060\070\040\164\150\141\167\164\145\054\040\111\156\143
\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172
\145\144\040\165\163\145\040\157\156\154\171\061\044\060\042\006
\003\125\004\003\023\033\164\150\141\167\164\145\040\120\162\151
\155\141\162\171\040\122\157\157\164\040\103\101\040\055\040\107
\063

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\140\001\227\267\106\247\352\264\264\232\326\113\057\367
\220\373

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\052\060\202\003\022\240\003\002\001\002\002\020\140
\001\227\267\106\247\352\264\264\232\326\113\057\367\220\373\060
\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\201
\256\061\013\060\011\006\003\125\004\006\023\002\125\123\061\025
\060\023\006\003\125\004\012\023\014\164\150\141\167\164\145\054
\040\111\156\143\056\061\050\060\046\006\003\125\004\013\023\037
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123\145
\162\166\151\143\145\163\040\104\151\166\151\163\151\157\156\061
\070\060\066\006\003\125\004\013\023\057\050\143\051\040\062\060
\060\070\040\164\150\141\167\164\145\054\040\111\156\143\056\040
\055\040\106\157\162\040\141\165\164\150\157\162\151\172\145\144
\040\165\163\145\040\157\156\154\171\061\044\060\042\006\003\125
\004\003\023\033\164\150\141\167\164\145\040\120\162\151\155\141
\162\171\040\122\157\157\164\040\103\101\040\055\040\107\063\060
\036\027\015\060\070\060\064\060\062\060\060\060\060\060\132
\027\015\063\067\061\062\060\061\062\063\065\071\065\071\132\060
\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123\061
\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164\145
\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013\023

\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123
\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157\156
\061\070\060\066\006\003\125\004\013\023\057\050\143\051\040\062
\060\060\070\040\164\150\141\167\164\145\054\040\111\156\143\056
\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172\145
\144\040\165\163\145\040\157\156\154\171\061\044\060\042\006\003
\125\004\003\023\033\164\150\141\167\164\145\040\120\162\151\155
\141\162\171\040\122\157\157\164\040\103\101\040\055\040\107\063
\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001
\000\262\277\047\054\373\333\330\133\335\170\173\033\236\167\146
\201\313\076\274\174\256\363\246\047\232\064\243\150\061\161\070
\063\142\344\363\161\146\171\261\251\145\243\245\213\325\217\140
\055\077\102\314\252\153\062\300\043\313\054\101\335\344\337\374
\141\234\342\163\262\042\225\021\103\030\137\304\266\037\127\154
\012\005\130\042\310\066\114\072\174\245\321\317\206\257\210\247
\104\002\023\164\161\163\012\102\131\002\370\033\024\153\102\337
\157\137\272\153\202\242\235\133\347\112\275\036\001\162\333\113
\164\350\073\177\177\175\037\004\264\046\233\340\264\132\254\107
\075\125\270\327\260\046\122\050\001\061\100\146\330\331\044\275
\366\052\330\354\041\111\134\233\366\172\351\177\125\065\176\226
\153\215\223\223\047\313\222\273\352\254\100\300\237\302\370\200
\317\135\364\132\334\316\164\206\246\076\154\013\123\312\275\222
\316\031\006\162\346\014\134\070\151\307\004\326\274\154\316\133
\366\367\150\234\334\045\025\110\210\241\351\251\370\230\234\340
\363\325\061\050\141\021\154\147\226\215\071\231\313\302\105\044
\071\002\003\001\000\001\243\102\060\100\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125
\035\016\004\026\004\024\255\154\252\224\140\234\355\344\377\372
\076\012\164\053\143\003\367\266\131\277\060\015\006\011\052\206
\110\206\367\015\001\001\013\005\000\003\202\001\001\000\032\100
\330\225\145\254\011\222\211\306\071\364\020\345\251\016\146\123
\135\170\336\372\044\221\273\347\104\121\337\306\026\064\012\357
\152\104\121\352\053\007\212\003\172\303\353\077\012\054\122\026
\240\053\103\271\045\220\077\160\251\063\045\155\105\032\050\073
\047\317\252\303\051\102\033\337\073\114\300\063\064\133\101\210
\277\153\053\145\257\050\357\262\365\303\252\146\316\173\126\356
\267\310\313\147\301\311\234\032\030\270\304\303\111\003\361\140
\016\120\315\106\305\363\167\171\367\266\025\340\070\333\307\057
\050\240\014\077\167\046\164\331\045\022\332\061\332\032\036\334
\051\101\221\042\074\151\247\273\002\362\266\134\047\003\211\364
\006\352\233\344\162\202\343\241\011\301\351\000\031\323\076\324
\160\153\272\161\246\252\130\256\364\273\351\154\266\357\207\314
\233\273\377\071\346\126\141\323\012\247\304\134\114\140\173\005
\167\046\172\277\330\007\122\054\142\367\160\143\331\071\274\157
\034\302\171\334\166\051\257\316\305\054\144\004\136\210\066\156
\061\324\100\032\142\064\066\077\065\001\256\254\143\240

END

#

Trust for Certificate "thawte Primary Root CA - G3"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "thawte Primary Root CA - G3"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

\361\213\123\215\033\351\003\266\246\360\126\103\133\027\025\211
\312\363\153\362

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

\373\033\135\103\212\224\315\104\306\166\362\103\113\107\347\061

END

CKA_ISSUER

MULTILINE_OCTAL

\060\201\256\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\025\060\023\006\003\125\004\012\023\014\164\150\141\167\164
\145\054\040\111\156\143\056\061\050\060\046\006\003\125\004\013
\023\037\103\145\162\164\151\146\151\143\141\164\151\157\156\040
\123\145\162\166\151\143\145\163\040\104\151\166\151\163\151\157
\156\061\070\060\066\006\003\125\004\013\023\057\050\143\051\040
\062\060\060\070\040\164\150\141\167\164\145\054\040\111\156\143
\056\040\055\040\106\157\162\040\141\165\164\150\157\162\151\172
\145\144\040\165\163\145\040\157\156\154\171\061\044\060\042\006
\003\125\004\003\023\033\164\150\141\167\164\145\040\120\162\151
\155\141\162\171\040\122\157\157\164\040\103\101\040\055\040\107
\063

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\140\001\227\267\106\247\352\264\264\232\326\113\057\367
\220\373

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "GeoTrust Primary Certification Authority - G2"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "GeoTrust Primary Certification Authority - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162
\165\163\164\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\050\143\051\040\062\060\060\067\040\107\145\157\124
\162\165\163\164\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\066\060\064\006\003\125\004\003\023\055\107\145
\157\124\162\165\163\164\040\120\162\151\155\141\162\171\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\040\055\040\107\062

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL
\060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162
\165\163\164\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\050\143\051\040\062\060\060\067\040\107\145\157\124
\162\165\163\164\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\066\060\064\006\003\125\004\003\023\055\107\145
\157\124\162\165\163\164\040\120\162\151\155\141\162\171\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\040\055\040\107\062

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\020\074\262\364\110\012\000\342\376\353\044\073\136\140\076
\303\153

END

CKA_VALUE MULTILINE_OCTAL

\060\202\002\256\060\202\002\065\240\003\002\001\002\002\020\074
\262\364\110\012\000\342\376\353\044\073\136\140\076\303\153\060
\012\006\010\052\206\110\316\075\004\003\003\060\201\230\061\013
\060\011\006\003\125\004\006\023\002\125\123\061\026\060\024\006
\003\125\004\012\023\015\107\145\157\124\162\165\163\164\040\111
\156\143\056\061\071\060\067\006\003\125\004\013\023\060\050\143
\051\040\062\060\060\067\040\107\145\157\124\162\165\163\164\040
\111\156\143\056\040\055\040\106\157\162\040\141\165\164\150\157
\162\151\172\145\144\040\165\163\145\040\157\156\154\171\061\066
\060\064\006\003\125\004\003\023\055\107\145\157\124\162\165\163
\164\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164
\171\040\055\040\107\062\060\036\027\015\060\067\061\061\060\065
\060\060\060\060\060\060\132\027\015\063\070\060\061\061\070\062
\063\065\071\065\071\132\060\201\230\061\013\060\011\006\003\125

```
\004\006\023\002\125\123\061\026\060\024\006\003\125\004\012\023
\015\107\145\157\124\162\165\163\164\040\111\156\143\056\061\071
\060\067\006\003\125\004\013\023\060\050\143\051\040\062\060\060
\067\040\107\145\157\124\162\165\163\164\040\111\156\143\056\040
\055\040\106\157\162\040\141\165\164\150\157\162\151\172\145\144
\040\165\163\145\040\157\156\154\171\061\066\060\064\006\003\125
\004\003\023\055\107\145\157\124\162\165\163\164\040\120\162\151
\155\141\162\171\040\103\145\162\164\151\146\151\143\141\164\151
\157\156\040\101\165\164\150\157\162\151\164\171\040\055\040\107
\062\060\166\060\020\006\007\052\206\110\316\075\002\001\006\005
\053\201\004\000\042\003\142\000\004\025\261\350\375\003\025\103
\345\254\353\207\067\021\142\357\322\203\066\122\175\105\127\013
\112\215\173\124\073\072\156\137\025\002\300\120\246\317\045\057
\175\312\110\270\307\120\143\034\052\041\010\174\232\066\330\013
\376\321\046\305\130\061\060\050\045\363\135\135\243\270\266\245
\264\222\355\154\054\237\353\335\103\211\242\074\113\110\221\035
\120\354\046\337\326\140\056\275\041\243\102\060\100\060\017\006
\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060\016
\006\003\125\035\017\001\001\377\004\004\003\002\001\006\060\035
\006\003\125\035\016\004\026\004\024\025\137\065\127\121\125\373
\045\262\255\003\151\374\001\243\372\276\021\125\325\060\012\006
\010\052\206\110\316\075\004\003\003\003\147\000\060\144\002\060
\144\226\131\246\350\011\336\213\272\372\132\210\210\360\037\221
\323\106\250\362\112\114\002\143\373\154\137\070\333\056\101\223
\251\016\346\235\334\061\034\262\240\247\030\034\171\341\307\066
\002\060\072\126\257\232\164\154\366\373\203\340\063\323\010\137
\241\234\302\133\237\106\326\266\313\221\006\143\242\006\347\063
\254\076\250\201\022\320\313\272\320\222\013\266\236\226\252\004
\017\212
END
```

```
#
Trust for Certificate "GeoTrust Primary Certification Authority - G2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "GeoTrust Primary Certification Authority - G2"
CKA_CERT_SHA1_HASH
MULTILINE_OCTAL
\215\027\204\325\067\363\003\175\354\160\376\127\213\121\232\231
\346\020\327\260
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\001\136\330\153\275\157\075\216\241\061\370\022\340\230\163\152
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\230\061\013\060\011\006\003\125\004\006\023\002\125\123
```

```
\061\026\060\024\006\003\125\004\012\023\015\107\145\157\124\162
\165\163\164\040\111\156\143\056\061\071\060\067\006\003\125\004
\013\023\060\050\143\051\040\062\060\060\067\040\107\145\157\124
\162\165\163\164\040\111\156\143\056\040\055\040\106\157\162\040
\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040\157
\156\154\171\061\066\060\064\006\003\125\004\003\023\055\107\145
\157\124\162\165\163\164\040\120\162\151\155\141\162\171\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\101\165\164
\150\157\162\151\164\171\040\055\040\107\062
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\020\074\262\364\110\012\000\342\376\353\044\073\136\140\076
\303\153
```

END

CKA_TRUST_SERVER_AUTH

CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "VeriSign Universal Root Certification Authority"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "VeriSign Universal Root Certification Authority"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

```
\060\201\275\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\070\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\070\060\066\006\003\125\004\003\023
\057\126\145\162\151\123\151\147\156\040\125\156\151\166\145\162
\163\141\154\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
```

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

```
\060\201\275\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
```

\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\070\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\070\060\066\006\003\125\004\003\023
\057\126\145\162\151\123\151\147\156\040\125\156\151\166\145\162
\163\141\154\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\100\032\304\144\041\263\023\041\003\016\273\344\022\032
\305\035

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\271\060\202\003\241\240\003\002\001\002\002\020\100
\032\304\144\041\263\023\041\003\016\273\344\022\032\305\035\060
\015\006\011\052\206\110\206\367\015\001\001\013\005\000\060\201
\275\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027
\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151\147
\156\054\040\111\156\143\056\061\037\060\035\006\003\125\004\013
\023\026\126\145\162\151\123\151\147\156\040\124\162\165\163\164
\040\116\145\164\167\157\162\153\061\072\060\070\006\003\125\004
\013\023\061\050\143\051\040\062\060\060\070\040\126\145\162\151
\123\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162
\040\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040
\157\156\154\171\061\070\060\066\006\003\125\004\003\023\057\126
\145\162\151\123\151\147\156\040\125\156\151\166\145\162\163\141
\154\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\036
\027\015\060\070\060\064\060\062\060\060\060\060\060\132\027
\015\063\067\061\062\060\061\062\063\065\071\065\071\132\060\201
\275\061\013\060\011\006\003\125\004\006\023\002\125\123\061\027
\060\025\006\003\125\004\012\023\016\126\145\162\151\123\151\147
\156\054\040\111\156\143\056\061\037\060\035\006\003\125\004\013
\023\026\126\145\162\151\123\151\147\156\040\124\162\165\163\164
\040\116\145\164\167\157\162\153\061\072\060\070\006\003\125\004
\013\023\061\050\143\051\040\062\060\060\070\040\126\145\162\151
\123\151\147\156\054\040\111\156\143\056\040\055\040\106\157\162
\040\141\165\164\150\157\162\151\172\145\144\040\165\163\145\040
\157\156\154\171\061\070\060\066\006\003\125\004\003\023\057\126
\145\162\151\123\151\147\156\040\125\156\151\166\145\162\163\141
\154\040\122\157\157\164\040\103\145\162\164\151\146\151\143\141
\164\151\157\156\040\101\165\164\150\157\162\151\164\171\060\202
\001\042\060\015\006\011\052\206\110\206\367\015\001\001\001\005
\000\003\202\001\017\000\060\202\001\012\002\202\001\001\000\307

\141\067\136\261\001\064\333\142\327\025\233\377\130\132\214\043
\043\326\140\216\221\327\220\230\203\172\346\130\031\070\214\305
\366\345\144\205\264\242\161\373\355\275\271\332\315\115\000\264
\310\055\163\245\307\151\161\225\037\071\074\262\104\007\234\350
\016\372\115\112\304\041\337\051\141\217\062\042\141\202\305\207
\037\156\214\174\137\026\040\121\104\321\160\117\127\352\343\034
\343\314\171\356\130\330\016\302\263\105\223\300\054\347\232\027
\053\173\000\067\172\101\063\170\341\063\342\363\020\032\177\207
\054\276\366\365\367\102\342\345\277\207\142\211\137\000\113\337
\305\335\344\165\104\062\101\072\036\161\156\151\313\013\165\106
\010\321\312\322\053\225\320\317\373\271\100\153\144\214\127\115
\374\023\021\171\204\355\136\124\366\064\237\010\001\363\020\045
\006\027\112\332\361\035\172\146\153\230\140\146\244\331\357\322
\056\202\361\360\357\011\352\104\311\025\152\342\003\156\063\323
\254\237\125\000\307\366\010\152\224\271\137\334\340\063\361\204
\140\371\133\047\021\264\374\026\362\273\126\152\200\045\215\002
\003\001\000\001\243\201\262\060\201\257\060\017\006\003\125\035
\023\001\001\377\004\005\060\003\001\001\377\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\155\006\010\053
\006\001\005\005\007\001\014\004\141\060\137\241\135\240\133\060
\131\060\127\060\125\026\011\151\155\141\147\145\057\147\151\146
\060\041\060\037\060\007\006\005\053\016\003\002\032\004\024\217
\345\323\032\206\254\215\216\153\303\317\200\152\324\110\030\054
\173\031\056\060\045\026\043\150\164\164\160\072\057\057\154\157
\147\157\056\166\145\162\151\163\151\147\156\056\143\157\155\057
\166\163\154\157\147\157\056\147\151\146\060\035\006\003\125\035
\016\004\026\004\024\266\167\372\151\110\107\237\123\022\325\302
\352\007\062\166\007\321\227\007\031\060\015\006\011\052\206\110
\206\367\015\001\001\013\005\000\003\202\001\001\000\112\370\370
\260\003\346\054\147\173\344\224\167\143\314\156\114\371\175\016
\015\334\310\271\065\271\160\117\143\372\044\372\154\203\214\107
\235\073\143\363\232\371\166\062\225\221\261\167\274\254\232\276
\261\344\061\041\306\201\225\126\132\016\261\302\324\261\246\131
\254\361\143\313\270\114\035\131\220\112\357\220\026\050\037\132
\256\020\373\201\120\070\014\154\314\361\075\303\365\143\343\263
\343\041\311\044\071\351\375\025\146\106\364\033\021\320\115\163
\243\175\106\371\075\355\250\137\142\324\361\077\370\340\164\127
\053\030\235\201\264\304\050\332\224\227\245\160\353\254\035\276
\007\021\360\325\333\335\345\214\360\325\062\260\203\346\127\342
\217\277\276\241\252\277\075\035\265\324\070\352\327\260\134\072
\117\152\077\217\300\146\154\143\252\351\331\244\026\364\201\321
\225\024\016\175\315\225\064\331\322\217\160\163\201\173\234\176
\275\230\141\330\105\207\230\220\305\353\206\060\306\065\277\360
\377\303\125\210\203\113\357\005\222\006\161\362\270\230\223\267
\354\315\202\141\361\070\346\117\227\230\052\132\215

END

#

```

Trust for Certificate "VeriSign Universal Root Certification Authority"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "VeriSign Universal Root Certification Authority"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\066\171\312\065\146\207\162\060\115\060\245\373\207\073\017\247
\173\267\015\124
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\216\255\265\001\252\115\201\344\214\035\321\341\024\000\225\031
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\275\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\070\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\070\060\066\006\003\125\004\003\023
\057\126\145\162\151\123\151\147\156\040\125\156\151\166\145\162
\163\141\154\040\122\157\157\164\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\100\032\304\144\041\263\023\041\003\016\273\344\022\032
\305\035
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "VeriSign Class 3 Public Primary Certification Authority - G4"
#
CKA_CLASS CK_OBJECT_CLASS
CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "VeriSign Class 3 Public Primary Certification Authority - G4"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL

```


\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\067\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\064

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\067\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\064

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\020\057\200\376\043\214\016\042\017\110\147\022\050\221\207
\254\263

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\204\060\202\003\012\240\003\002\001\002\002\020\057
\200\376\043\214\016\042\017\110\147\022\050\221\207\254\263\060
\012\006\010\052\206\110\316\075\004\003\003\060\201\312\061\013
\060\011\006\003\125\004\006\023\002\125\123\061\027\060\025\006
\003\125\004\012\023\016\126\145\162\151\123\151\147\156\054\040
\111\156\143\056\061\037\060\035\006\003\125\004\013\023\026\126
\145\162\151\123\151\147\156\040\124\162\165\163\164\040\116\145
\164\167\157\162\153\061\072\060\070\006\003\125\004\013\023\061
\050\143\051\040\062\060\060\067\040\126\145\162\151\123\151\147
\156\054\040\111\156\143\056\040\055\040\106\157\162\040\141\165
\164\150\157\162\151\172\145\144\040\165\163\145\040\157\156\154

\171\061\105\060\103\006\003\125\004\003\023\074\126\145\162\151
\123\151\147\156\040\103\154\141\163\163\040\063\040\120\165\142
\154\151\143\040\120\162\151\155\141\162\171\040\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\101\165\164\150\157\162
\151\164\171\040\055\040\107\064\060\036\027\015\060\067\061\061
\060\065\060\060\060\060\060\060\132\027\015\063\070\060\061\061
\070\062\063\065\071\065\071\132\060\201\312\061\013\060\011\006
\003\125\004\006\023\002\125\123\061\027\060\025\006\003\125\004
\012\023\016\126\145\162\151\123\151\147\156\054\040\111\156\143
\056\061\037\060\035\006\003\125\004\013\023\026\126\145\162\151
\123\151\147\156\040\124\162\165\163\164\040\116\145\164\167\157
\162\153\061\072\060\070\006\003\125\004\013\023\061\050\143\051
\040\062\060\060\067\040\126\145\162\151\123\151\147\156\054\040
\111\156\143\056\040\055\040\106\157\162\040\141\165\164\150\157
\162\151\172\145\144\040\165\163\145\040\157\156\154\171\061\105
\060\103\006\003\125\004\003\023\074\126\145\162\151\123\151\147
\156\040\103\154\141\163\163\040\063\040\120\165\142\154\151\143
\040\120\162\151\155\141\162\171\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\101\165\164\150\157\162\151\164\171
\040\055\040\107\064\060\166\060\020\006\007\052\206\110\316\075
\002\001\006\005\053\201\004\000\042\003\142\000\004\247\126\172
\174\122\332\144\233\016\055\134\330\136\254\222\075\376\001\346
\031\112\075\024\003\113\372\140\047\040\331\203\211\151\372\124
\306\232\030\136\125\052\144\336\006\366\215\112\073\255\020\074
\145\075\220\210\004\211\340\060\141\263\256\135\001\247\173\336
\174\262\276\312\145\141\000\206\256\332\217\173\320\211\255\115
\035\131\232\101\261\274\107\200\334\236\142\303\371\243\201\262
\060\201\257\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\016\006\003\125\035\017\001\001\377\004\004
\003\002\001\006\060\155\006\010\053\006\001\005\005\007\001\014
\004\141\060\137\241\135\240\133\060\131\060\127\060\125\026\011
\151\155\141\147\145\057\147\151\146\060\041\060\037\060\007\006
\005\053\016\003\002\032\004\024\217\345\323\032\206\254\215\216
\153\303\317\200\152\324\110\030\054\173\031\056\060\045\026\043
\150\164\164\160\072\057\057\154\157\147\157\056\166\145\162\151
\163\151\147\156\056\143\157\155\057\166\163\154\157\147\157\056
\147\151\146\060\035\006\003\125\035\016\004\026\004\024\263\026
\221\375\356\246\156\344\265\056\111\217\207\170\201\200\354\345
\261\265\060\012\006\010\052\206\110\316\075\004\003\003\003\150
\000\060\145\002\060\146\041\014\030\046\140\132\070\173\126\102
\340\247\374\066\204\121\221\040\054\166\115\103\075\304\035\204
\043\320\254\326\174\065\006\316\315\151\275\220\015\333\154\110
\102\035\016\252\102\002\061\000\234\075\110\071\043\071\130\032
\025\022\131\152\236\357\325\131\262\035\122\054\231\161\315\307
\051\337\033\052\141\173\161\321\336\363\300\345\015\072\112\252
\055\247\330\206\052\335\056\020

END

```

#
Trust for Certificate "VeriSign Class 3 Public Primary Certification Authority - G4"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE
CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "VeriSign Class 3 Public Primary Certification Authority - G4"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\042\325\330\337\217\002\061\321\215\367\235\267\317\212\055\144
\311\077\154\072
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\072\122\341\347\375\157\072\343\157\363\157\231\033\371\042\101
END
CKA_ISSUER MULTILINE_OCTAL
\060\201\312\061\013\060\011\006\003\125\004\006\023\002\125\123
\061\027\060\025\006\003\125\004\012\023\016\126\145\162\151\123
\151\147\156\054\040\111\156\143\056\061\037\060\035\006\003\125
\004\013\023\026\126\145\162\151\123\151\147\156\040\124\162\165
\163\164\040\116\145\164\167\157\162\153\061\072\060\070\006\003
\125\004\013\023\061\050\143\051\040\062\060\060\067\040\126\145
\162\151\123\151\147\156\054\040\111\156\143\056\040\055\040\106
\157\162\040\141\165\164\150\157\162\151\172\145\144\040\165\163
\145\040\157\156\154\171\061\105\060\103\006\003\125\004\003\023
\074\126\145\162\151\123\151\147\156\040\103\154\141\163\163\040
\063\040\120\165\142\154\151\143\040\120\162\151\155\141\162\171
\040\103\145\162\164\151\146\151\143\141\164\151\157\156\040\101
\165\164\150\157\162\151\164\171\040\055\040\107\064
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\020\057\200\376\043\214\016\042\017\110\147\022\050\221\207
\254\263
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

```

```

#
# Certificate "NetLock Arany (Class Gold) Ftanúsítvány"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Arany (Class Gold) Ftanúsítvány"

```

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\201\247\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160
\145\163\164\061\025\060\023\006\003\125\004\012\014\014\116\145
\164\114\157\143\153\040\113\146\164\056\061\067\060\065\006\003
\125\004\013\014\056\124\141\156\303\272\163\303\255\164\166\303
\241\156\171\153\151\141\144\303\263\153\040\050\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\123\145\162\166\151\143
\145\163\051\061\065\060\063\006\003\125\004\003\014\054\116\145
\164\114\157\143\153\040\101\162\141\156\171\040\050\103\154\141
\163\163\040\107\157\154\144\051\040\106\305\221\164\141\156\303
\272\163\303\255\164\166\303\241\156\171

END

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\201\247\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160
\145\163\164\061\025\060\023\006\003\125\004\012\014\014\116\145
\164\114\157\143\153\040\113\146\164\056\061\067\060\065\006\003
\125\004\013\014\056\124\141\156\303\272\163\303\255\164\166\303
\241\156\171\153\151\141\144\303\263\153\040\050\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\123\145\162\166\151\143
\145\163\051\061\065\060\063\006\003\125\004\003\014\054\116\145
\164\114\157\143\153\040\101\162\141\156\171\040\050\103\154\141
\163\163\040\107\157\154\144\051\040\106\305\221\164\141\156\303
\272\163\303\255\164\166\303\241\156\171

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\006\111\101\054\344\000\020

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\025\060\202\002\375\240\003\002\001\002\002\006\111
\101\054\344\000\020\060\015\006\011\052\206\110\206\367\015\001
\001\013\005\000\060\201\247\061\013\060\011\006\003\125\004\006
\023\002\110\125\061\021\060\017\006\003\125\004\007\014\010\102
\165\144\141\160\145\163\164\061\025\060\023\006\003\125\004\012
\014\014\116\145\164\114\157\143\153\040\113\146\164\056\061\067
\060\065\006\003\125\004\013\014\056\124\141\156\303\272\163\303
\255\164\166\303\241\156\171\153\151\141\144\303\263\153\040\050
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123\145
\162\166\151\143\145\163\051\061\065\060\063\006\003\125\004\003
\014\054\116\145\164\114\157\143\153\040\101\162\141\156\171\040
\050\103\154\141\163\163\040\107\157\154\144\051\040\106\305\221
\164\141\156\303\272\163\303\255\164\166\303\241\156\171\060\036
\027\015\060\070\061\062\061\061\061\065\060\070\062\061\132\027

\015\062\070\061\062\060\066\061\065\060\070\062\061\132\060\201
\247\061\013\060\011\006\003\125\004\006\023\002\110\125\061\021
\060\017\006\003\125\004\007\014\010\102\165\144\141\160\145\163
\164\061\025\060\023\006\003\125\004\012\014\014\116\145\164\114
\157\143\153\040\113\146\164\056\061\067\060\065\006\003\125\004
\013\014\056\124\141\156\303\272\163\303\255\164\166\303\241\156
\171\153\151\141\144\303\263\153\040\050\103\145\162\164\151\146
\151\143\141\164\151\157\156\040\123\145\162\166\151\143\145\163
\051\061\065\060\063\006\003\125\004\003\014\054\116\145\164\114
\157\143\153\040\101\162\141\156\171\040\050\103\154\141\163\163
\040\107\157\154\144\051\040\106\305\221\164\141\156\303\272\163
\303\255\164\166\303\241\156\171\060\202\001\042\060\015\006\011
\052\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000
\060\202\001\012\002\202\001\001\000\304\044\136\163\276\113\155
\024\303\241\364\343\227\220\156\322\060\105\036\074\356\147\331
\144\340\032\212\177\312\060\312\203\343\040\301\343\364\072\323
\224\137\032\174\133\155\277\060\117\204\047\366\237\037\111\274
\306\231\012\220\362\017\365\177\103\204\067\143\121\213\172\245
\160\374\172\130\315\216\233\355\303\106\154\204\160\135\332\363
\001\220\043\374\116\060\251\176\341\047\143\347\355\144\074\240
\270\311\063\143\376\026\220\377\260\270\375\327\250\300\300\224
\103\013\266\325\131\246\236\126\320\044\037\160\171\257\333\071
\124\015\145\165\331\025\101\224\001\257\136\354\366\215\361\377
\255\144\376\040\232\327\134\353\376\246\037\010\144\243\213\166
\125\255\036\073\050\140\056\207\045\350\252\257\037\306\144\106
\040\267\160\177\074\336\110\333\226\123\267\071\167\344\032\342
\307\026\204\166\227\133\057\273\031\025\205\370\151\205\365\231
\247\251\362\064\247\251\266\246\003\374\157\206\075\124\174\166
\004\233\153\371\100\135\000\064\307\056\231\165\235\345\210\003
\252\115\370\003\322\102\166\300\033\002\003\000\250\213\243\105
\060\103\060\022\006\003\125\035\023\001\001\377\004\010\060\006
\001\001\377\002\001\004\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\006\060\035\006\003\125\035\016\004\026\004
\024\314\372\147\223\360\266\270\320\245\300\036\363\123\375\214
\123\337\203\327\226\060\015\006\011\052\206\110\206\367\015\001
\001\013\005\000\003\202\001\001\000\253\177\356\034\026\251\234
\074\121\000\240\300\021\010\005\247\231\346\157\001\210\124\141
\156\361\271\030\255\112\255\376\201\100\043\224\057\373\165\174
\057\050\113\142\044\201\202\013\365\141\361\034\156\270\141\070
\353\201\372\142\241\073\132\142\323\224\145\304\341\346\155\202
\370\057\045\160\262\041\046\301\162\121\037\214\054\303\204\220
\303\132\217\272\317\364\247\145\245\353\230\321\373\005\262\106
\165\025\043\152\157\205\143\060\200\360\325\236\037\051\034\302
\154\260\120\131\135\220\133\073\250\015\060\317\277\175\177\316
\361\235\203\275\311\106\156\040\246\371\141\121\272\041\057\173
\276\245\025\143\241\324\225\207\361\236\271\363\211\363\075\205
\270\270\333\276\265\271\051\371\332\067\005\000\111\224\003\204
\104\347\277\103\061\317\165\213\045\321\364\246\144\365\222\366

```
\253\005\353\075\351\245\013\066\142\332\314\006\137\066\213\266
\136\061\270\052\373\136\366\161\337\104\046\236\304\346\015\221
\264\056\165\225\200\121\152\113\060\246\260\142\241\223\361\233
\330\316\304\143\165\077\131\107\261
END
```

```
#
```

```
Trust for Certificate "NetLock Arany (Class Gold) Ftanúsítvány"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "NetLock Arany (Class Gold) Ftanúsítvány"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\006\010\077\131\077\025\241\004\240\151\244\153\251\003\320\006
\267\227\011\221
END
```

```
CKA_CERT_MD5_HASH
MULTILINE_OCTAL
\305\241\267\377\163\335\326\327\064\062\030\337\374\074\255\210
END
```

```
CKA_ISSUER MULTILINE_OCTAL
\060\201\247\061\013\060\011\006\003\125\004\006\023\002\110\125
\061\021\060\017\006\003\125\004\007\014\010\102\165\144\141\160
\145\163\164\061\025\060\023\006\003\125\004\012\014\014\116\145
\164\114\157\143\153\040\113\146\164\056\061\067\060\065\006\003
\125\004\013\014\056\124\141\156\303\272\163\303\255\164\166\303
\241\156\171\153\151\141\144\303\263\153\040\050\103\145\162\164
\151\146\151\143\141\164\151\157\156\040\123\145\162\166\151\143
\145\163\051\061\065\060\063\006\003\125\004\003\014\054\116\145
\164\114\157\143\153\040\101\162\141\156\171\040\050\103\154\141
\163\163\040\107\157\154\144\051\040\106\305\221\164\141\156\303
\272\163\303\255\164\166\303\241\156\171
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\006\111\101\054\344\000\020
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION
CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "Staat der Nederlanden Root CA - G2"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Staat der Nederlanden Root CA - G2"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\014\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\053\060\051\006\003\125\004\003\014\042\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101\040\055\040\107\062
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\014\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\053\060\051\006\003\125\004\003\014\042\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\004\000\230\226\214
END
CKA_VALUE MULTILINE_OCTAL
\060\202\005\312\060\202\003\262\240\003\002\001\002\002\004\000
\230\226\214\060\015\006\011\052\206\110\206\367\015\001\001\013
\005\000\060\132\061\013\060\011\006\003\125\004\006\023\002\116
\114\061\036\060\034\006\003\125\004\012\014\025\123\164\141\141
\164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145
\156\061\053\060\051\006\003\125\004\003\014\042\123\164\141\141
\164\040\144\145\162\040\116\145\144\145\162\154\141\156\144\145
\156\040\122\157\157\164\040\103\101\040\055\040\107\062\060\036
\027\015\060\070\060\063\062\066\061\061\061\070\061\067\132\027
\015\062\060\060\063\062\065\061\061\060\063\061\060\132\060\132
\061\013\060\011\006\003\125\004\006\023\002\116\114\061\036\060
\034\006\003\125\004\012\014\025\123\164\141\141\164\040\144\145
\162\040\116\145\144\145\162\154\141\156\144\145\156\061\053\060
\051\006\003\125\004\003\014\042\123\164\141\141\164\040\144\145
\162\040\116\145\144\145\162\154\141\156\144\145\156\040\122\157
\157\164\040\103\101\040\055\040\107\062\060\202\002\042\060\015
\006\011\052\206\110\206\367\015\001\001\001\005\000\003\202\002
\017\000\060\202\002\012\002\202\002\001\000\305\131\347\157\165
\252\076\113\234\265\270\254\236\013\344\371\331\312\253\135\217
\265\071\020\202\327\257\121\340\073\341\000\110\152\317\332\341
\006\103\021\231\252\024\045\022\255\042\350\000\155\103\304\251
\270\345\037\211\113\147\275\141\110\357\375\322\340\140\210\345
```

\271\030\140\050\303\167\053\255\260\067\252\067\336\144\131\052
\106\127\344\113\271\370\067\174\325\066\347\200\301\266\363\324
\147\233\226\350\316\327\306\012\123\320\153\111\226\363\243\013
\005\167\110\367\045\345\160\254\060\024\040\045\343\177\165\132
\345\110\370\116\173\003\007\004\372\202\141\207\156\360\073\304
\244\307\320\365\164\076\245\135\032\010\362\233\045\322\366\254
\004\046\076\125\072\142\050\245\173\262\060\257\370\067\302\321
\272\326\070\375\364\357\111\060\067\231\046\041\110\205\001\251
\345\026\347\334\220\125\337\017\350\070\315\231\067\041\117\135
\365\042\157\152\305\022\026\140\027\125\362\145\146\246\247\060
\221\070\301\070\035\206\004\204\272\032\045\170\136\235\257\314
\120\140\326\023\207\122\355\143\037\155\145\175\302\025\030\164
\312\341\176\144\051\214\162\330\026\023\175\013\111\112\361\050
\033\040\164\153\305\075\335\260\252\110\011\075\056\202\224\315
\032\145\331\053\210\232\231\274\030\176\237\356\175\146\174\076
\275\224\270\201\316\315\230\060\170\301\157\147\320\276\137\340
\150\355\336\342\261\311\054\131\170\222\252\337\053\140\143\362
\345\136\271\343\312\372\177\120\206\076\242\064\030\014\011\150
\050\021\034\344\341\271\134\076\107\272\062\077\030\314\133\204
\365\363\153\164\304\162\164\341\343\213\240\112\275\215\146\057
\352\255\065\332\040\323\210\202\141\360\022\042\266\274\320\325
\244\354\257\124\210\045\044\074\247\155\261\162\051\077\076\127
\246\177\125\257\156\046\306\376\347\314\100\134\121\104\201\012
\170\336\112\316\125\277\035\325\331\267\126\357\360\166\377\013
\171\265\257\275\373\251\151\221\106\227\150\200\024\066\035\263
\177\273\051\230\066\245\040\372\202\140\142\063\244\354\326\272
\007\247\156\305\317\024\246\347\326\222\064\330\201\365\374\035
\135\252\134\036\366\243\115\073\270\367\071\002\003\001\000\001
\243\201\227\060\201\224\060\017\006\003\125\035\023\001\001\377
\004\005\060\003\001\001\377\060\122\006\003\125\035\040\004\113
\060\111\060\107\006\004\125\035\040\000\060\077\060\075\006\010
\053\006\001\005\005\007\002\001\026\061\150\164\164\160\072\057
\057\167\167\167\056\160\153\151\157\166\145\162\150\145\151\144
\056\156\154\057\160\157\154\151\143\151\145\163\057\162\157\157
\164\055\160\157\154\151\143\171\055\107\062\060\016\006\003\125
\035\017\001\001\377\004\004\003\002\001\006\060\035\006\003\125
\035\016\004\026\004\024\221\150\062\207\025\035\211\342\265\361
\254\066\050\064\215\013\174\142\210\353\060\015\006\011\052\206
\110\206\367\015\001\001\013\005\000\003\202\002\001\000\250\101
\112\147\052\222\201\202\120\156\341\327\330\263\071\073\363\002
\025\011\120\121\357\055\275\044\173\210\206\073\371\264\274\222
\011\226\271\366\300\253\043\140\006\171\214\021\116\121\322\171
\200\063\373\235\110\276\354\101\103\201\037\176\107\100\034\345
\172\010\312\252\213\165\255\024\304\302\350\146\074\202\007\247
\346\047\202\133\030\346\017\156\331\120\076\212\102\030\051\306
\264\126\374\126\020\240\005\027\275\014\043\177\364\223\355\234
\032\121\276\335\105\101\277\221\044\264\037\214\351\137\317\173
\041\231\237\225\237\071\072\106\034\154\371\315\173\234\220\315


```
\050\251\307\251\125\273\254\142\064\142\065\023\113\024\072\125
\203\271\206\215\222\246\306\364\007\045\124\314\026\127\022\112
\202\170\310\024\331\027\202\046\055\135\040\037\171\256\376\324
\160\026\026\225\203\330\065\071\377\122\135\165\034\026\305\023
\125\317\107\314\165\145\122\112\336\360\260\247\344\012\226\013
\373\255\302\342\045\204\262\335\344\275\176\131\154\233\360\360
\330\347\312\362\351\227\070\176\211\276\314\373\071\027\141\077
\162\333\072\221\330\145\001\031\035\255\120\244\127\012\174\113
\274\234\161\163\052\105\121\031\205\314\216\375\107\247\164\225
\035\250\321\257\116\027\261\151\046\302\252\170\127\133\305\115
\247\345\236\005\027\224\312\262\137\240\111\030\215\064\351\046
\154\110\036\252\150\222\005\341\202\163\132\233\334\007\133\010
\155\175\235\327\215\041\331\374\024\040\252\302\105\337\077\347
\000\262\121\344\302\370\005\271\171\032\214\064\363\236\133\344
\067\133\153\112\337\054\127\212\100\132\066\272\335\165\104\010
\067\102\160\014\376\334\136\041\240\243\212\300\220\234\150\332
\120\346\105\020\107\170\266\116\322\145\311\303\067\337\341\102
\143\260\127\067\105\055\173\212\234\277\005\352\145\125\063\367
\071\020\305\050\052\041\172\033\212\304\044\371\077\025\310\232
\025\040\365\125\142\226\355\155\223\120\274\344\252\170\255\331
\313\012\145\207\246\146\301\304\201\243\167\072\130\036\013\356
\203\213\235\036\322\122\244\314\035\157\260\230\155\224\061\265
\370\161\012\334\271\374\175\062\140\346\353\257\212\001
END
```

#

```
Trust for Certificate "Staat der Nederlanden Root CA - G2"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "Staat der Nederlanden Root CA - G2"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\131\257\202\171\221\206\307\264\165\007\313\317\003\127\106\353
\004\335\267\026
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\174\245\017\370\133\232\175\155\060\256\124\132\343\102\242\212
END
CKA_ISSUER MULTILINE_OCTAL
\060\132\061\013\060\011\006\003\125\004\006\023\002\116\114\061
\036\060\034\006\003\125\004\012\014\025\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\061
\053\060\051\006\003\125\004\003\014\042\123\164\141\141\164\040
\144\145\162\040\116\145\144\145\162\154\141\156\144\145\156\040
\122\157\157\164\040\103\101\040\055\040\107\062
END
CKA_SERIAL_NUMBER
```

```
MULTILINE_OCTAL
\002\004\000\230\226\214
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "CA Disig"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "CA Disig"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\112\061\013\060\011\006\003\125\004\006\023\002\123\113\061
\023\060\021\006\003\125\004\007\023\012\102\162\141\164\151\163
\154\141\166\141\061\023\060\021\006\003\125\004\012\023\012\104
\151\163\151\147\040\141\056\163\056\061\021\060\017\006\003\125
\004\003\023\010\103\101\040\104\151\163\151\147
END
CKA_ID
UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\112\061\013\060\011\006\003\125\004\006\023\002\123\113\061
\023\060\021\006\003\125\004\007\023\012\102\162\141\164\151\163
\154\141\166\141\061\023\060\021\006\003\125\004\012\023\012\104
\151\163\151\147\040\141\056\163\056\061\021\060\017\006\003\125
\004\003\023\010\103\101\040\104\151\163\151\147
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\004\017\060\202\002\367\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\112\061\013\060\011\006\003\125\004\006\023\002\123\113\061\023
\060\021\006\003\125\004\007\023\012\102\162\141\164\151\163\154
\141\166\141\061\023\060\021\006\003\125\004\012\023\012\104\151
\163\151\147\040\141\056\163\056\061\021\060\017\006\003\125\004
\003\023\010\103\101\040\104\151\163\151\147\060\036\027\015\060
\066\060\063\062\062\060\061\063\071\063\064\132\027\015\061\066
\060\063\062\062\060\061\063\071\063\064\132\060\112\061\013\060
\011\006\003\125\004\006\023\002\123\113\061\023\060\021\006\003
\125\004\007\023\012\102\162\141\164\151\163\154\141\166\141\061
```

\023\060\021\006\003\125\004\012\023\012\104\151\163\151\147\040
\141\056\163\056\061\021\060\017\006\003\125\004\003\023\010\103
\101\040\104\151\163\151\147\060\202\001\042\060\015\006\011\052
\206\110\206\367\015\001\001\001\005\000\003\202\001\017\000\060
\202\001\012\002\202\001\001\000\222\366\061\301\175\210\375\231
\001\251\330\173\362\161\165\361\061\306\363\165\146\372\121\050
\106\204\227\170\064\274\154\374\274\105\131\210\046\030\112\304
\067\037\241\112\104\275\343\161\004\365\104\027\342\077\374\110
\130\157\134\236\172\011\272\121\067\042\043\146\103\041\260\074
\144\242\370\152\025\016\077\353\121\341\124\251\335\006\231\327
\232\074\124\213\071\003\077\017\305\316\306\353\203\162\002\250
\037\161\363\055\370\165\010\333\142\114\350\372\316\371\347\152
\037\266\153\065\202\272\342\217\026\222\175\005\014\154\106\003
\135\300\355\151\277\072\301\212\240\350\216\331\271\105\050\207
\010\354\264\312\025\276\202\335\265\104\213\055\255\206\014\150
\142\155\205\126\362\254\024\143\072\306\321\231\254\064\170\126
\113\317\266\255\077\214\212\327\004\345\343\170\114\365\206\252
\365\217\372\075\154\161\243\055\312\147\353\150\173\156\063\251
\014\202\050\250\114\152\041\100\025\040\014\046\133\203\302\251
\026\025\300\044\202\135\053\026\255\312\143\366\164\000\260\337
\103\304\020\140\126\147\143\105\002\003\001\000\001\243\201\377
\060\201\374\060\017\006\003\125\035\023\001\001\377\004\005\060
\003\001\001\377\060\035\006\003\125\035\016\004\026\004\024\215
\262\111\150\235\162\010\045\271\300\047\365\120\223\126\110\106
\161\371\217\060\016\006\003\125\035\017\001\001\377\004\004\003
\002\001\006\060\066\006\003\125\035\021\004\057\060\055\201\023
\143\141\157\160\145\162\141\164\157\162\100\144\151\163\151\147
\056\163\153\206\026\150\164\164\160\072\057\057\167\167\167\056
\144\151\163\151\147\056\163\153\057\143\141\060\146\006\003\125
\035\037\004\137\060\135\060\055\240\053\240\051\206\047\150\164
\164\160\072\057\057\167\167\167\056\144\151\163\151\147\056\163
\153\057\143\141\057\143\162\154\057\143\141\137\144\151\163\151
\147\056\143\162\154\060\054\240\052\240\050\206\046\150\164\164
\160\072\057\057\143\141\056\144\151\163\151\147\056\163\153\057
\143\141\057\143\162\154\057\143\141\137\144\151\163\151\147\056
\143\162\154\060\032\006\003\125\035\040\004\023\060\021\060\017
\006\015\053\201\036\221\223\346\012\000\000\000\001\001\001\060
\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003\202
\001\001\000\135\064\164\141\114\257\073\330\377\237\155\130\066
\034\075\013\201\015\022\053\106\020\200\375\347\074\047\320\172
\310\251\266\176\164\060\063\243\072\212\173\164\300\171\171\102
\223\155\377\261\051\024\202\253\041\214\057\027\371\077\046\057
\365\131\306\357\200\006\267\232\111\051\354\316\176\161\074\152
\020\101\300\366\323\232\262\174\132\221\234\300\254\133\310\115
\136\367\341\123\377\103\167\374\236\113\147\154\327\363\203\321
\240\340\177\045\337\270\230\013\232\062\070\154\060\240\363\377
\010\025\063\367\120\112\173\076\243\076\040\251\334\057\126\200
\012\355\101\120\260\311\364\354\262\343\046\104\000\016\157\236

```
\006\274\042\226\123\160\145\304\120\012\106\153\244\057\047\201
\022\047\023\137\020\241\166\316\212\173\067\352\303\071\141\003
\225\230\072\347\154\210\045\010\374\171\150\015\207\175\142\370
\264\137\373\305\330\114\275\130\274\077\103\133\324\036\001\115
\074\143\276\043\357\214\315\132\120\270\150\124\371\012\231\063
\021\000\341\236\302\106\167\202\365\131\006\214\041\114\207\011
\315\345\250
END
```

```
#
```

```
Trust for Certificate "CA Disig"
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
```

```
CKA_TOKEN CK_BBOOL CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE
```

```
CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "CA Disig"
```

```
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
```

```
\052\310\325\213\127\316\277\057\111\257\362\374\166\217\121\024
\142\220\172\101
```

```
END
```

```
CKA_CERT_MD5_HASH MULTILINE_OCTAL
```

```
\077\105\226\071\342\120\207\367\273\376\230\014\074\040\230\346
```

```
END
```

```
CKA_ISSUER MULTILINE_OCTAL
```

```
\060\112\061\013\060\011\006\003\125\004\006\023\002\123\113\061
\023\060\021\006\003\125\004\007\023\012\102\162\141\164\151\163
\154\141\166\141\061\023\060\021\006\003\125\004\012\023\012\104
\151\163\151\147\040\141\056\163\056\061\021\060\017\006\003\125
\004\003\023\010\103\101\040\104\151\163\151\147
```

```
END
```

```
CKA_SERIAL_NUMBER MULTILINE_OCTAL
```

```
\002\001\001
```

```
END
```

```
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
```

```
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE
```

```
#
```

```
# Certificate "Juur-SK"
```

```
#
```

```
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
```

```
CKA_TOKEN CK_BBOOL
```

```
CK_TRUE
```

```
CKA_PRIVATE CK_BBOOL CK_FALSE
```

```
CKA_MODIFIABLE CK_BBOOL CK_FALSE
```

```
CKA_LABEL UTF8 "Juur-SK"
```

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\135\061\030\060\026\006\011\052\206\110\206\367\015\001\011
\001\026\011\160\153\151\100\163\153\056\145\145\061\013\060\011
\006\003\125\004\006\023\002\105\105\061\042\060\040\006\003\125
\004\012\023\031\101\123\040\123\145\162\164\151\146\151\164\163
\145\145\162\151\155\151\163\153\145\163\153\165\163\061\020\060
\016\006\003\125\004\003\023\007\112\165\165\162\055\123\113

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\135\061\030\060\026\006\011\052\206\110\206\367\015\001\011
\001\026\011\160\153\151\100\163\153\056\145\145\061\013\060\011
\006\003\125\004\006\023\002\105\105\061\042\060\040\006\003\125
\004\012\023\031\101\123\040\123\145\162\164\151\146\151\164\163
\145\145\162\151\155\151\163\153\145\163\153\165\163\061\020\060
\016\006\003\125\004\003\023\007\112\165\165\162\055\123\113

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\004\073\216\113\374

END

CKA_VALUE MULTILINE_OCTAL

\060\202\004\346\060\202\003\316\240\003\002\001\002\002\004\073
\216\113\374\060\015\006\011\052\206\110\206\367\015\001\001\005
\005\000\060\135\061\030\060\026\006\011\052\206\110\206\367\015
\001\011\001\026\011\160\153\151\100\163\153\056\145\145\061\013
\060\011\006\003\125\004\006\023\002\105\105\061\042\060\040\006
\003\125\004\012\023\031\101\123\040\123\145\162\164\151\146\151
\164\163\145\145\162\151\155\151\163\153\145\163\153\165\163\061
\020\060\016\006\003\125\004\003\023\007\112\165\165\162\055\123
\113\060\036\027\015\060\061\060\070\063\060\061\064\062\063\060
\061\132\027\015\061\066\060\070\062\066\061\064\062\063\060\061
\132\060\135\061\030\060\026\006\011\052\206\110\206\367\015\001
\011\001\026\011\160\153\151\100\163\153\056\145\145\061\013\060
\011\006\003\125\004\006\023\002\105\105\061\042\060\040\006\003
\125\004\012\023\031\101\123\040\123\145\162\164\151\146\151\164
\163\145\145\162\151\155\151\163\153\145\163\153\165\163\061\020
\060\016\006\003\125\004\003\023\007\112\165\165\162\055\123\113
\060\202\001\042\060\015\006\011\052\206\110\206\367\015\001\001
\001\005\000\003\202\001\017\000\060\202\001\012\002\202\001\001
\000\201\161\066\076\063\007\326\343\060\215\023\176\167\062\106
\313\317\031\262\140\061\106\227\206\364\230\106\244\302\145\105
\317\323\100\174\343\132\042\250\020\170\063\314\210\261\323\201
\112\366\142\027\173\137\115\012\056\320\317\213\043\356\117\002
\116\273\353\016\312\275\030\143\350\200\034\215\341\034\215\075
\340\377\133\137\352\144\345\227\350\077\231\177\014\012\011\063
\000\032\123\247\041\341\070\113\326\203\033\255\257\144\302\371

\034\172\214\146\110\115\146\037\030\012\342\076\273\037\007\145
\223\205\271\032\260\271\304\373\015\021\366\365\326\371\033\307
\054\053\267\030\121\376\340\173\366\250\110\257\154\073\117\057
\357\370\321\107\036\046\127\360\121\035\063\226\377\357\131\075
\332\115\321\025\064\307\352\077\026\110\173\221\034\200\103\017
\075\270\005\076\321\263\225\315\330\312\017\302\103\147\333\267
\223\340\042\202\056\276\365\150\050\203\271\301\073\151\173\040
\332\116\234\155\341\272\315\217\172\154\260\011\042\327\213\013
\333\034\325\132\046\133\015\300\352\345\140\320\237\376\065\337
\077\002\003\001\000\001\243\202\001\254\060\202\001\250\060\017
\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060
\202\001\026\006\003\125\035\040\004\202\001\015\060\202\001\011
\060\202\001\005\006\012\053\006\001\004\001\316\037\001\001\001
\060\201\366\060\201\320\006\010\053\006\001\005\005\007\002\002
\060\201\303\036\201\300\000\123\000\145\000\145\000\040\000\163
\000\145\000\162\000\164\000\151\000\146\000\151\000\153\000\141
\000\141\000\164\000\040\000\157\000\156\000\040\000\166\000\344
\000\154\000\152\000\141\000\163\000\164\000\141\000\164\000\165
\000\144\000\040\000\101\000\123\000\055\000\151\000\163\000\040
\000\123\000\145\000\162\000\164\000\151\000\146\000\151\000\164
\000\163\000\145\000\145\000\162\000\151\000\155\000\151\000\163
\000\153\000\145\000\163\000\153\000\165\000\163\000\040\000\141
\000\154\000\141\000\155\000\055\000\123\000\113\000\040\000\163
\000\145\000\162\000\164\000\151\000\146\000\151\000\153\000\141
\000\141\000\164\000\151\000\144\000\145\000\040\000\153\000\151
\000\156\000\156\000\151\000\164\000\141\000\155\000\151\000\163
\000\145\000\153\000\163\060\041\006\010\053\006\001\005\005\007
\002\001\026\025\150\164\164\160\072\057\057\167\167\167\056\163
\153\056\145\145\057\143\160\163\057\060\053\006\003\125\035\037
\004\044\060\042\060\040\240\036\240\034\206\032\150\164\164\160
\072\057\057\167\167\167\056\163\153\056\145\145\057\152\165\165
\162\057\143\162\154\057\060\035\006\003\125\035\016\004\026\004
\024\004\252\172\107\243\344\211\257\032\317\012\100\247\030\077
\157\357\351\175\276\060\037\006\003\125\035\043\004\030\060\026
\200\024\004\252\172\107\243\344\211\257\032\317\012\100\247\030
\077\157\357\351\175\276\060\016\006\003\125\035\017\001\001\377
\004\004\003\002\001\346\060\015\006\011\052\206\110\206\367\015
\001\001\005\005\000\003\202\001\001\000\173\301\030\224\123\242
\011\363\376\046\147\232\120\344\303\005\057\053\065\170\221\114
\174\250\021\021\171\114\111\131\254\310\367\205\145\134\106\273
\073\020\240\002\257\315\117\265\314\066\052\354\135\376\357\240
\221\311\266\223\157\174\200\124\354\307\010\160\015\216\373\202
\354\052\140\170\151\066\066\321\305\234\213\151\265\100\310\224
\145\167\362\127\041\146\073\316\205\100\266\063\143\032\277\171
\036\374\134\035\323\035\223\033\213\014\135\205\275\231\060\062
\030\011\221\122\351\174\241\272\377\144\222\232\354\376\065\356
\214\057\256\374\040\206\354\112\336\033\170\062\067\246\201\322
\235\257\132\022\026\312\231\133\374\157\155\016\305\240\036\206

```
\311\221\320\134\230\202\137\143\014\212\132\253\330\225\246\314
\313\212\326\277\144\113\216\312\212\262\260\351\041\062\236\252
\250\205\230\064\201\071\041\073\250\072\122\062\075\366\153\067
\206\006\132\025\230\334\360\021\146\376\064\040\267\003\364\101
\020\175\071\204\171\226\162\143\266\226\002\345\153\271\255\031
\115\273\306\104\333\066\313\052\234\216
```

END

#

Trust for Certificate "Juur-SK"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Juur-SK"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\100\235\113\331\027\265\134\047\266\233\144\313\230\042\104\015
\315\011\270\211
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\252\216\135\331\370\333\012\130\267\215\046\207\154\202\065\125
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\135\061\030\060\026\006\011\052\206\110\206\367\015\001\011
\001\026\011\160\153\151\100\163\153\056\145\145\061\013\060\011
\006\003\125\004\006\023\002\105\105\061\042\060\040\006\003\125
\004\012\023\031\101\123\040\123\145\162\164\151\146\151\164\163
\145\145\162\151\155\151\163\153\145\163\153\165\163\061\020\060
\016\006\003\125\004\003\023\007\112\165\165\162\055\123\113
```

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

```
\002\004\073\216\113\374
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#

Certificate "Hongkong Post Root CA 1"

#

CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Hongkong Post Root CA 1"

CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509

CKA_SUBJECT MULTILINE_OCTAL

\060\107\061\013\060\011\006\003\125\004\006\023\002\110\113\061
\026\060\024\006\003\125\004\012\023\015\110\157\156\147\153\157
\156\147\040\120\157\163\164\061\040\060\036\006\003\125\004\003
\023\027\110\157\156\147\153\157\156\147\040\120\157\163\164\040
\122\157\157\164\040\103\101\040\061

END

CKA_ID UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\107\061\013\060\011\006\003\125\004\006\023\002\110\113\061
\026\060\024\006\003\125\004\012\023\015\110\157\156\147\153\157
\156\147\040\120\157\163\164\061\040\060\036\006\003\125\004\003
\023\027\110\157\156\147\153\157\156\147\040\120\157\163\164\040
\122\157\157\164\040\103\101\040\061

END

CKA_SERIAL_NUMBER

MULTILINE_OCTAL

\002\002\003\350

END

CKA_VALUE MULTILINE_OCTAL

\060\202\003\060\060\202\002\030\240\003\002\001\002\002\002\003
\350\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000
\060\107\061\013\060\011\006\003\125\004\006\023\002\110\113\061
\026\060\024\006\003\125\004\012\023\015\110\157\156\147\153\157
\156\147\040\120\157\163\164\061\040\060\036\006\003\125\004\003
\023\027\110\157\156\147\153\157\156\147\040\120\157\163\164\040
\122\157\157\164\040\103\101\040\061\060\036\027\015\060\063\060
\065\061\065\060\065\061\063\061\064\132\027\015\062\063\060\065
\061\065\060\064\065\062\062\071\132\060\107\061\013\060\011\006
\003\125\004\006\023\002\110\113\061\026\060\024\006\003\125\004
\012\023\015\110\157\156\147\153\157\156\147\040\120\157\163\164
\061\040\060\036\006\003\125\004\003\023\027\110\157\156\147\153
\157\156\147\040\120\157\163\164\040\122\157\157\164\040\103\101
\040\061\060\202\001\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002\202
\001\001\000\254\377\070\266\351\146\002\111\343\242\264\341\220
\371\100\217\171\371\342\275\171\376\002\275\356\044\222\035\042
\366\332\205\162\151\376\327\077\011\324\335\221\265\002\234\320
\215\132\341\125\303\120\206\271\051\046\302\343\331\240\361\151
\003\050\040\200\105\042\055\126\247\073\124\225\126\042\131\037
\050\337\037\040\075\155\242\066\276\043\240\261\156\265\261\047
\077\071\123\011\352\253\152\350\164\262\302\145\134\216\277\174
\303\170\204\315\236\026\374\365\056\117\040\052\010\237\167\363
\305\036\304\232\122\146\036\110\136\343\020\006\217\042\230\341
\145\216\033\135\043\146\073\270\245\062\121\310\206\252\241\251
\236\177\166\224\302\246\154\267\101\360\325\310\006\070\346\324
\014\342\363\073\114\155\120\214\304\203\047\301\023\204\131\075
\236\165\164\266\330\002\136\072\220\172\300\102\066\162\354\152


```
\115\334\357\304\000\337\023\030\127\137\046\170\310\326\012\171
\167\277\367\257\267\166\271\245\013\204\027\135\020\352\157\341
\253\225\021\137\155\074\243\134\115\203\133\362\263\031\212\200
\213\013\207\002\003\001\000\001\243\046\060\044\060\022\006\003
\125\035\023\001\001\377\004\010\060\006\001\001\377\002\001\003
\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\306
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\003
\202\001\001\000\016\106\325\074\256\342\207\331\136\201\213\002
\230\101\010\214\114\274\332\333\356\047\033\202\347\152\105\354
\026\213\117\205\240\363\262\160\275\132\226\272\312\156\155\356
\106\213\156\347\052\056\226\263\031\063\353\264\237\250\262\067
\356\230\250\227\266\056\266\147\047\324\246\111\375\034\223\145
\166\236\102\057\334\042\154\232\117\362\132\025\071\261\161\327
\053\121\350\155\034\230\300\331\052\364\241\202\173\325\311\101
\242\043\001\164\070\125\213\017\271\056\147\242\040\004\067\332
\234\013\323\027\041\340\217\227\171\064\157\204\110\002\040\063
\033\346\064\104\237\221\160\364\200\136\204\103\302\051\322\154
\022\024\344\141\215\254\020\220\236\204\120\273\360\226\157\105
\237\212\363\312\154\117\372\021\072\025\025\106\303\315\037\203
\133\055\101\022\355\120\147\101\023\075\041\253\224\212\252\116
\174\301\261\373\247\326\265\047\057\227\253\156\340\035\342\321
\034\054\037\104\342\374\276\221\241\234\373\326\051\123\163\206
\237\123\330\103\016\135\326\143\202\161\035\200\164\312\366\342
\002\153\331\132
```

END

#

Trust for Certificate "Hongkong Post Root CA 1"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "Hongkong Post Root CA 1"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\326\332\250\040\215\011\322\025\115\044\265\057\313\064\156\262
\130\262\212\130
```

END

CKA_CERT_MD5_HASH

MULTILINE_OCTAL

```
\250\015\157\071\170\271\103\155\167\102\155\230\132\314\043\312
```

END

CKA_ISSUER MULTILINE_OCTAL

```
\060\107\061\013\060\011\006\003\125\004\006\023\002\110\113\061
\026\060\024\006\003\125\004\012\023\015\110\157\156\147\153\157
\156\147\040\120\157\163\164\061\040\060\036\006\003\125\004\003
\023\027\110\157\156\147\153\157\156\147\040\120\157\163\164\040
\122\157\157\164\040\103\101\040\061
```

END

```

CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\002\003\350
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "SecureSign RootCA11"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SecureSign RootCA11"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE
CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\130\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\053\060\051\006\003\125\004\012\023\042\112\141\160\141\156\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123\145
\162\166\151\143\145\163\054\040\111\156\143\056\061\034\060\032
\006\003\125\004\003\023\023\123\145\143\165\162\145\123\151\147
\156\040\122\157\157\164\103\101\061\061
END
CKA_ID UTF8 "0"
CKA_ISSUER MULTILINE_OCTAL
\060\130\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\053\060\051\006\003\125\004\012\023\042\112\141\160\141\156\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123\145
\162\166\151\143\145\163\054\040\111\156\143\056\061\034\060\032
\006\003\125\004\003\023\023\123\145\143\165\162\145\123\151\147
\156\040\122\157\157\164\103\101\061\061
END
CKA_SERIAL_NUMBER MULTILINE_OCTAL
\002\001\001
END
CKA_VALUE MULTILINE_OCTAL
\060\202\003\155\060\202\002\125\240\003\002\001\002\002\001\001
\060\015\006\011\052\206\110\206\367\015\001\001\005\005\000\060
\130\061\013\060\011\006\003\125\004\006\023\002\112\120\061\053
\060\051\006\003\125\004\012\023\042\112\141\160\141\156\040\103
\145\162\164\151\146\151\143\141\164\151\157\156\040\123\145\162
\166\151\143\145\163\054\040\111\156\143\056\061\034\060\032\006
\003\125\004\003\023\023\123\145\143\165\162\145\123\151\147\156
\040\122\157\157\164\103\101\061\061\060\036\027\015\060\071\060
\064\060\070\060\064\065\066\064\067\132\027\015\062\071\060\064

```

\060\070\060\064\065\066\064\067\132\060\130\061\013\060\011\006
\003\125\004\006\023\002\112\120\061\053\060\051\006\003\125\004
\012\023\042\112\141\160\141\156\040\103\145\162\164\151\146\151
\143\141\164\151\157\156\040\123\145\162\166\151\143\145\163\054
\040\111\156\143\056\061\034\060\032\006\003\125\004\003\023\023
\123\145\143\165\162\145\123\151\147\156\040\122\157\157\164\103
\101\061\061\060\202\001\042\060\015\006\011\052\206\110\206\367
\015\001\001\001\005\000\003\202\001\017\000\060\202\001\012\002
\202\001\001\000\375\167\252\245\034\220\005\073\313\114\233\063
\213\132\024\105\244\347\220\026\321\337\127\322\041\020\244\027
\375\337\254\326\037\247\344\333\174\367\354\337\270\003\332\224
\130\375\135\162\174\214\077\137\001\147\164\025\226\343\002\074
\207\333\256\313\001\216\302\363\146\306\205\105\364\002\306\072
\265\142\262\257\372\234\277\244\346\324\200\060\230\363\015\266
\223\217\251\324\330\066\362\260\374\212\312\054\241\025\063\225
\061\332\300\033\362\356\142\231\206\143\077\277\335\223\052\203
\250\166\271\023\037\267\316\116\102\205\217\042\347\056\032\362
\225\011\262\005\265\104\116\167\241\040\275\251\362\116\012\175
\120\255\365\005\015\105\117\106\161\375\050\076\123\373\004\330
\055\327\145\035\112\033\372\317\073\260\061\232\065\156\310\213
\006\323\000\221\362\224\010\145\114\261\064\006\000\172\211\342
\360\307\003\131\317\325\326\350\247\062\263\346\230\100\206\305
\315\047\022\213\314\173\316\267\021\074\142\140\007\043\076\053
\100\156\224\200\011\155\266\263\157\167\157\065\010\120\373\002
\207\305\076\211\002\003\001\000\001\243\102\060\100\060\035\006
\003\125\035\016\004\026\004\024\133\370\115\117\262\245\206\324
\072\322\361\143\232\240\276\011\366\127\267\336\060\016\006\003
\125\035\017\001\001\377\004\004\003\002\001\006\060\017\006\003
\125\035\023\001\001\377\004\005\060\003\001\001\377\060\015\006
\011\052\206\110\206\367\015\001\001\005\005\000\003\202\001\001
\000\240\241\070\026\146\056\247\126\037\041\234\006\372\035\355
\271\042\305\070\046\330\116\117\354\243\177\171\336\106\041\241
\207\167\217\007\010\232\262\244\305\257\017\062\230\013\174\146
\051\266\233\175\045\122\111\103\253\114\056\053\156\172\160\257
\026\016\343\002\154\373\102\346\030\235\105\330\125\310\350\073
\335\347\341\364\056\013\034\064\134\154\130\112\373\214\210\120
\137\225\034\277\355\253\042\265\145\263\205\272\236\017\270\255
\345\172\033\212\120\072\035\275\015\274\173\124\120\013\271\102
\257\125\240\030\201\255\145\231\357\276\344\234\277\304\205\253
\101\262\124\157\334\045\315\355\170\342\216\014\215\011\111\335
\143\173\132\151\226\002\041\250\275\122\131\351\175\065\313\310
\122\312\177\201\376\331\153\323\367\021\355\045\337\370\347\371
\244\372\162\227\204\123\015\245\320\062\030\121\166\131\024\154
\017\353\354\137\200\214\165\103\203\303\205\230\377\114\236\055
\015\344\167\203\223\116\265\226\007\213\050\023\233\214\031\215
\101\047\111\100\356\336\346\043\104\071\334\241\042\326\272\003
\362

END

```

#
Trust for Certificate "SecureSign RootCA11"
CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "SecureSign RootCA11"
CKA_CERT_SHA1_HASH MULTILINE_OCTAL
\073\304\237\110\370\363\163\240\234\036\275\370\133\261\303\145
\307\330\021\263
END
CKA_CERT_MD5_HASH MULTILINE_OCTAL
\267\122\164\342\222\264\200\223\362\165\344\314\327\362\352\046
END
CKA_ISSUER MULTILINE_OCTAL
\060\130\061\013\060\011\006\003\125\004\006\023\002\112\120\061
\053\060\051\006\003\125\004\012\023\042\112\141\160\141\156\040
\103\145\162\164\151\146\151\143\141\164\151\157\156\040\123\145
\162\166\151\143\145\163\054\040\111\156\143\056\061\034\060\032
\006\003\125\004\003\023\023\123\145\143\165\162\145\123\151\147
\156\040\122\157\157\164\103\101\061\061
END
CKA_SERIAL_NUMBER
MULTILINE_OCTAL
\002\001\001
END
CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR
CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUST_UNKNOWN
CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

#
# Certificate "ACEDICOM Root"
#
CKA_CLASS CK_OBJECT_CLASS CKO_CERTIFICATE
CKA_TOKEN CK_BBOOL CK_TRUE
CKA_PRIVATE CK_BBOOL CK_FALSE
CKA_MODIFIABLE CK_BBOOL CK_FALSE
CKA_LABEL UTF8 "ACEDICOM Root"
CKA_CERTIFICATE_TYPE CK_CERTIFICATE_TYPE CKC_X_509
CKA_SUBJECT MULTILINE_OCTAL
\060\104\061\026\060\024\006\003\125\004\003\014\015\101\103\105
\104\111\103\117\115\040\122\157\157\164\061\014\060\012\006\003
\125\004\013\014\003\120\113\111\061\017\060\015\006\003\125\004
\012\014\006\105\104\111\103\117\115\061\013\060\011\006\003\125
\004\006\023\002\105\123
END

```

CKA_ID

UTF8 "0"

CKA_ISSUER MULTILINE_OCTAL

\060\104\061\026\060\024\006\003\125\004\003\014\015\101\103\105
\104\111\103\117\115\040\122\157\157\164\061\014\060\012\006\003
\125\004\013\014\003\120\113\111\061\017\060\015\006\003\125\004
\012\014\006\105\104\111\103\117\115\061\013\060\011\006\003\125
\004\006\023\002\105\123

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

\002\010\141\215\307\206\073\001\202\005

END

CKA_VALUE MULTILINE_OCTAL

\060\202\005\265\060\202\003\235\240\003\002\001\002\002\010\141
\215\307\206\073\001\202\005\060\015\006\011\052\206\110\206\367
\015\001\001\005\005\000\060\104\061\026\060\024\006\003\125\004
\003\014\015\101\103\105\104\111\103\117\115\040\122\157\157\164
\061\014\060\012\006\003\125\004\013\014\003\120\113\111\061\017
\060\015\006\003\125\004\012\014\006\105\104\111\103\117\115\061
\013\060\011\006\003\125\004\006\023\002\105\123\060\036\027\015
\060\070\060\064\061\070\061\066\062\064\062\062\132\027\015\062
\070\060\064\061\063\061\066\062\064\062\062\132\060\104\061\026
\060\024\006\003\125\004\003\014\015\101\103\105\104\111\103\117
\115\040\122\157\157\164\061\014\060\012\006\003\125\004\013\014
\003\120\113\111\061\017\060\015\006\003\125\004\012\014\006\105
\104\111\103\117\115\061\013\060\011\006\003\125\004\006\023\002
\105\123\060\202\002\042\060\015\006\011\052\206\110\206\367\015
\001\001\001\005\000\003\202\002\017\000\060\202\002\012\002\202
\002\001\000\377\222\225\341\150\006\166\264\054\310\130\110\312
\375\200\124\051\125\143\044\377\220\145\233\020\165\173\303\152
\333\142\002\001\362\030\206\265\174\132\070\261\344\130\271\373
\323\330\055\237\275\062\067\277\054\025\155\276\265\364\041\322
\023\221\331\007\255\001\005\326\363\275\167\316\137\102\201\012
\371\152\343\203\000\250\053\056\125\023\143\201\312\107\034\173
\134\026\127\172\033\203\140\004\072\076\145\303\315\001\336\336
\244\326\014\272\216\336\331\004\356\027\126\042\233\217\143\375
\115\026\013\267\173\167\214\371\045\265\321\155\231\022\056\117
\032\270\346\352\004\222\256\075\021\271\121\102\075\207\260\061
\205\257\171\132\234\376\347\116\136\222\117\103\374\253\072\255
\245\022\046\146\271\342\014\327\230\316\324\130\245\225\100\012
\267\104\235\023\164\053\302\245\353\042\025\230\020\330\213\305
\004\237\035\217\140\345\006\033\233\317\271\171\240\075\242\043
\077\102\077\153\372\034\003\173\060\215\316\154\300\277\346\033
\137\277\147\270\204\031\325\025\357\173\313\220\066\061\142\311
\274\002\253\106\137\233\376\032\150\224\064\075\220\216\255\366
\344\035\011\177\112\210\070\077\276\147\375\064\226\365\035\274
\060\164\313\070\356\325\154\253\324\374\364\000\267\000\133\205
\062\026\166\063\351\330\243\231\235\005\000\252\026\346\363\201

\175\157\175\252\206\155\255\025\164\323\304\242\161\252\364\024
\175\347\062\270\037\274\325\361\116\275\157\027\002\071\327\016
\225\102\072\307\000\076\351\046\143\021\352\013\321\112\377\030
\235\262\327\173\057\072\331\226\373\350\036\222\256\023\125\310
\331\047\366\334\110\033\260\044\301\205\343\167\235\232\244\363
\014\021\035\015\310\264\024\356\265\202\127\011\277\040\130\177
\057\042\043\330\160\313\171\154\311\113\362\251\052\310\374\207
\053\327\032\120\370\047\350\057\103\343\072\275\330\127\161\375
\316\246\122\133\371\335\115\355\345\366\157\211\355\273\223\234
\166\041\165\360\222\114\051\367\057\234\001\056\376\120\106\236
\144\014\024\263\007\133\305\302\163\154\361\007\134\105\044\024
\065\256\203\361\152\115\211\172\372\263\330\055\146\360\066\207
\365\053\123\002\003\001\000\001\243\201\252\060\201\247\060\017
\006\003\125\035\023\001\001\377\004\005\060\003\001\001\377\060
\037\006\003\125\035\043\004\030\060\026\200\024\246\263\341\053
\053\111\266\327\163\241\252\224\365\001\347\163\145\114\254\120
\060\016\006\003\125\035\017\001\001\377\004\004\003\002\001\206
\060\035\006\003\125\035\016\004\026\004\024\246\263\341\053\053
\111\266\327\163\241\252\224\365\001\347\163\145\114\254\120\060
\104\006\003\125\035\040\004\075\060\073\060\071\006\004\125\035
\040\000\060\061\060\057\006\010\053\006\001\005\005\007\002\001
\026\043\150\164\164\160\072\057\057\141\143\145\144\151\143\157
\155\056\145\144\151\143\157\155\147\162\157\165\160\056\143\157
\155\057\144\157\143\060\015\006\011\052\206\110\206\367\015\001
\001\005\005\000\003\202\002\001\000\316\054\013\122\121\142\046
\175\014\047\203\217\305\366\332\240\150\173\117\222\136\352\244
\163\062\021\123\104\262\104\313\235\354\017\171\102\263\020\246
\307\015\235\313\266\372\077\072\174\352\277\210\123\033\074\367
\202\372\005\065\063\341\065\250\127\300\347\375\215\117\077\223
\062\117\170\146\003\167\007\130\351\225\310\176\076\320\171\000
\214\362\033\121\063\233\274\224\351\072\173\156\122\055\062\236
\043\244\105\373\266\056\023\260\213\030\261\335\316\325\035\247
\102\177\125\276\373\133\273\107\324\374\044\315\004\256\226\005
\025\326\254\316\060\363\312\013\305\272\342\042\340\246\255\042
\344\002\356\164\021\177\114\377\170\035\065\332\346\002\064\353
\030\022\141\167\006\011\026\143\352\030\255\242\207\037\362\307
\200\011\011\165\116\020\250\217\075\206\270\165\021\300\044\142
\212\226\173\112\105\351\354\131\305\276\153\203\346\341\350\254
\265\060\036\376\005\007\200\371\341\043\015\120\217\005\230\377
\054\137\350\073\266\255\317\201\265\041\207\312\010\052\043\047
\060\040\053\317\355\224\133\254\262\172\322\307\050\241\212\013
\233\115\112\054\155\205\077\011\162\074\147\342\331\334\007\272
\353\145\173\132\001\143\326\220\133\117\027\146\075\177\013\031
\243\223\143\020\122\052\237\024\026\130\342\334\245\364\241\026
\213\016\221\213\201\312\233\131\372\330\153\221\007\145\125\137
\122\037\257\072\373\220\335\151\245\133\234\155\016\054\266\372
\316\254\245\174\062\112\147\100\334\060\064\043\335\327\004\043
\146\360\374\125\200\247\373\146\031\202\065\147\142\160\071\136

```
\157\307\352\220\100\104\010\036\270\262\326\333\356\131\247\015
\030\171\064\274\124\030\136\123\312\064\121\355\105\012\346\216
\307\202\066\076\247\070\143\251\060\054\027\020\140\222\237\125
\207\022\131\020\302\017\147\151\021\314\116\036\176\112\232\255
\257\100\250\165\254\126\220\164\270\240\234\245\171\157\334\351
\032\310\151\005\351\272\372\003\263\174\344\340\116\302\316\235
\350\266\106\015\156\176\127\072\147\224\302\313\037\234\167\112
\147\116\151\206\103\223\070\373\266\333\117\203\221\324\140\176
\113\076\053\070\007\125\230\136\244
```

END

#

Trust for Certificate "ACEDICOM Root"

CKA_CLASS CK_OBJECT_CLASS CKO_NETSCAPE_TRUST

CKA_TOKEN CK_BBOOL CK_TRUE

CKA_PRIVATE CK_BBOOL CK_FALSE

CKA_MODIFIABLE CK_BBOOL CK_FALSE

CKA_LABEL UTF8 "ACEDICOM Root"

CKA_CERT_SHA1_HASH MULTILINE_OCTAL

```
\340\264\062\056\262\366\245\150\266\124\123\204\110\030\112\120
\066\207\103\204
```

END

CKA_CERT_MD5_HASH MULTILINE_OCTAL

```
\102\201\240\342\034\343\125\020\336\125\211\102\145\226\042\346
```

END

CKA_ISSUER

MULTILINE_OCTAL

```
\060\104\061\026\060\024\006\003\125\004\003\014\015\101\103\105
\104\111\103\117\115\040\122\157\157\164\061\014\060\012\006\003
\125\004\013\014\003\120\113\111\061\017\060\015\006\003\125\004
\012\014\006\105\104\111\103\117\115\061\013\060\011\006\003\125
\004\006\023\002\105\123
```

END

CKA_SERIAL_NUMBER MULTILINE_OCTAL

```
\002\010\141\215\307\206\073\001\202\005
```

END

CKA_TRUST_SERVER_AUTH CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_EMAIL_PROTECTION CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_CODE_SIGNING CK_TRUST CKT_NETSCAPE_TRUSTED_DELEGATOR

CKA_TRUST_STEP_UP_APPROVED CK_BBOOL CK_FALSE

Found in path(s):

* /opt/cola/permits/2005422292_1715245642.1702437/0/ca-certificates-2010.63-3.el6_1.5-1.src.rpm-cosi-expand-archive-E6GauXTs/certdata.txt

1.231 keyutils 1.4-4.el6

1.231.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source

code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without

limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or

table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing

the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the

original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the

library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute

and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

- c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such

parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through

any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c'
should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.232 gzip 1.3.12-19.el6_4

1.232.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.,
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to
using it. (Some other Free Software Foundation software is covered by

the GNU Lesser General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which

contains

a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies
of the Program's

source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide

a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or

executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number

of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License.

1.233 openssl 1.0.0-27.el6_4.2

1.233.1 Available under license :

Copyright (C) 1995-1997 Eric Young (eay@cryptsoft.com)

All rights reserved.

This package is an DES implementation written by Eric Young (eay@cryptsoft.com).

The implementation was written so as to conform with MIT's libdes.

This library is free for commercial and non-commercial use as long as the following conditions are aheared to. The following conditions apply to all code found in this distribution.

Copyright remains Eric Young's, and as such any Copyright notices in the code are not to be removed.

If this package is used in a product, Eric Young should be given attribution as the author of that the SSL library. This can be in the form of a textual message at program startup or in documentation (online or textual) provided with the package.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgement:
This product includes software developed by Eric Young (eay@cryptsoft.com)

THIS SOFTWARE IS PROVIDED BY ERIC YOUNG ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT

LIABILITY,
OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

The license and distribution terms for any publically available version or
derivative of this code cannot be changed. i.e. this code cannot simply be
copied and put under another distribution license
[including the GNU Public License.]

The reason behind this being stated in this direct manner is past
experience in code simply being copied and the attribution removed
from it and then being distributed as part of other packages. This
implementation was a non-trivial and unpaid effort.
Copyright (C) 1995-1997 Eric Young (eay@cryptsoft.com)
All rights reserved.

This package is an Blowfish implementation written
by Eric Young (eay@cryptsoft.com).

This library is free for commercial and non-commercial use as long as
the following conditions are adhered to. The following conditions
apply to all code found in this distribution.

Copyright remains Eric Young's, and as such any Copyright notices in
the code are not to be removed.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the copyright
notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in the
documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software
must display the following acknowledgement:
This product includes software developed by Eric Young (eay@cryptsoft.com)

THIS SOFTWARE IS PROVIDED BY ERIC YOUNG ``AS IS" AND
ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE
FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY

OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The license and distribution terms for any publically available version or derivative of this code cannot be changed. i.e. this code cannot simply be copied and put under another distrubution license [including the GNU Public License.]

The reason behind this being stated in this direct manner is past experience in code simply being copied and the attribution removed from it and then being distributed as part of other packages. This implementation was a non-trivial and unpaid effort.

LICENSE ISSUES

=====

The OpenSSL toolkit stays under a dual license, i.e. both the conditions of the OpenSSL License and the original SSLeay license apply to the toolkit. See below for the actual license texts. Actually both licenses are BSD-style Open Source licenses. In case of any license issues related to OpenSSL please contact openssl-core@openssl.org.

OpenSSL License

/* =====

- * Copyright (c) 1998-2008 The OpenSSL Project. All rights reserved.
- *
- * Redistribution and use in source and binary forms, with or without
- * modification, are permitted provided that the following conditions
- * are met:
- *
- * 1. Redistributions of source code must retain the above copyright
- * notice, this list of conditions and the following disclaimer.
- *
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer
- in
- * the documentation and/or other materials provided with the
- * distribution.
- *
- * 3. All advertising materials mentioning features or use of this
- * software must display the following acknowledgment:
- * "This product includes software developed by the OpenSSL Project
- * for use in the OpenSSL Toolkit. (<http://www.openssl.org/>)"
- *
- * 4. The names "OpenSSL Toolkit" and "OpenSSL Project" must not be used to

```

* endorse or promote products derived from this software without
* prior written permission. For written permission, please contact
* openssl-core@openssl.org.
*
* 5. Products derived from this software may not be called "OpenSSL"
* nor may "OpenSSL" appear in their names without prior written
* permission of the OpenSSL Project.
*
* 6. Redistributions of any form whatsoever must retain the following
* acknowledgment:
* "This product includes software developed by the OpenSSL Project
* for use in the OpenSSL Toolkit (http://www.openssl.org/)"
*
* THIS SOFTWARE IS PROVIDED BY THE OpenSSL PROJECT ``AS IS" AND ANY
* EXPRESSED OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
* IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR
* PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE OpenSSL PROJECT OR
* ITS CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
* SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT
* NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES;
* LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
* HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT,
* STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE)
* ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED
* OF THE POSSIBILITY OF SUCH DAMAGE.
* =====
*
* This product includes cryptographic software written by Eric Young
* (eay@cryptsoft.com). This product includes software
* written by Tim
* Hudson (tjh@cryptsoft.com).
*
*/

```

Original SSLeay License

```

/* Copyright (C) 1995-1998 Eric Young (eay@cryptsoft.com)
* All rights reserved.
*
* This package is an SSL implementation written
* by Eric Young (eay@cryptsoft.com).
* The implementation was written so as to conform with Netscapes SSL.
*
* This library is free for commercial and non-commercial use as long as
* the following conditions are aheared to. The following conditions
* apply to all code found in this distribution, be it the RC4, RSA,
* lhash, DES, etc., code; not just the SSL code. The SSL documentation

```

- * included with this distribution is covered by the same copyright terms
- * except that the holder is Tim Hudson (tjh@cryptsoft.com).
- *
- * Copyright remains Eric Young's, and as such any Copyright notices in
- * the code are not to be removed.
- * If this package is used in a product, Eric Young should be given attribution
- * as the author of the parts of the
- library used.
- * This can be in the form of a textual message at program startup or
- * in documentation (online or textual) provided with the package.
- *
- * Redistribution and use in source and binary forms, with or without
- * modification, are permitted provided that the following conditions
- * are met:
- * 1. Redistributions of source code must retain the copyright
- * notice, this list of conditions and the following disclaimer.
- * 2. Redistributions in binary form must reproduce the above copyright
- * notice, this list of conditions and the following disclaimer in the
- * documentation and/or other materials provided with the distribution.
- * 3. All advertising materials mentioning features or use of this software
- * must display the following acknowledgement:
- * "This product includes cryptographic software written by
- * Eric Young (eay@cryptsoft.com)"
- * The word 'cryptographic' can be left out if the routines from the library
- * being used are not cryptographic
- related :-).
- * 4. If you include any Windows specific code (or a derivative thereof) from
- * the apps directory (application code) you must include an acknowledgement:
- * "This product includes software written by Tim Hudson (tjh@cryptsoft.com)"
- *
- * THIS SOFTWARE IS PROVIDED BY ERIC YOUNG ``AS IS" AND
- * ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
- * IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
- * ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE
- * FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
- * DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
- * OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
- * HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
- * LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY
- * OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY
- OF
- * SUCH DAMAGE.
- *
- * The licence and distribution terms for any publically available version or
- * derivative of this code cannot be changed. i.e. this code cannot simply be
- * copied and put under another distribution licence
- * [including the GNU Public Licence.]
- */

1.234 cpp 4.4.7-3.el6

1.234.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute

and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such

parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through

any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands

`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your
school, if any, to sign a "copyright disclaimer" for the program, if
necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989

Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

Jan 21, 2002

The libgej library is licensed under the terms of the GNU General
Public License.

Linking this library statically or dynamically with other modules is
making a combined work based on this library. Thus, the terms and
conditions of the GNU General Public License cover the whole
combination.

As a special exception, the copyright holders of this library give you
permission to link this library with independent modules to produce an
executable, regardless of the license terms of these independent
modules, and to copy and distribute the resulting executable under
terms of your choice, provided that you also meet, for each linked
independent module, the terms and conditions of the license of that
module. An independent module is a module which is not derived from
or based on this library. If you modify this library, you may extend
this exception to your version of the library, but you are not
obligated to do so. If you do not wish to do so, delete this
exception statement

from your version.

You should have received a copy of the GNU General Public License along with libjava; see the file COPYING. If not, write to the Free Software Foundation, 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages

are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under

copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a

table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary

GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all

subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object

code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above

specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or

distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to

be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY

AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE
LIABLE TO YOU
FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR
CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE
LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING
RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A
FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF
SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH
DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!
libffi - Copyright (c) 1996-2003 Red Hat, Inc.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the ``Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED ``AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL CYGNUS SOLUTIONS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software

Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in

whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a

notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code

or executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy
the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version

number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

@ignore

@c Set file name and title for man page.

@setfilename gpl

@settitle GNU General Public License

@c man begin SEEALSO

gfdl(7), fsf-funding(7).

@c man end

@c man begin COPYRIGHT

Copyright @copyright{ } 2007 Free Software Foundation, Inc.

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

@c man end

@end ignore

@node Copying

@c man begin DESCRIPTION

@unnumbered GNU General Public License

@center Version 3, 29 June 2007

@c This file is intended to be included in another file.

@display

Copyright @copyright{ } 2007 Free Software Foundation, Inc. @url{<http://fsf.org/>}

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

@end display

@heading Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program

could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

@heading TERMS AND CONDITIONS

@enumerate 0

@item Definitions.

``This License" refers to version 3 of the GNU General Public License.

``Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

``The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as ``you". ``Licensees" and ``recipients" may be individuals or organizations.

To ``modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a ``modified version" of the earlier work or a work ``based on" the earlier work.

A ``covered work" means either the unmodified Program or a work based on the Program.

To ``propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To ``convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays ``Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If

the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

@item Source Code.

The ``source code" for a work means the preferred form of the work for making modifications to it. ``Object code" means any non-source form of a work.

A ``Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The ``System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A ``Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The ``Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

@item Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

@item Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

@item Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any

non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

@item Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

@enumerate a

@item

The work must carry prominent notices stating that you modified it, and giving a relevant date.

@item

The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to ``keep intact all notices".

@item

You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

@item

If the work has interactive user interfaces, each must display

Appropriate

Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

@end enumerate

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an ``aggregate" if the compilation and its resulting copyright are not

used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

@item Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

@enumerate

a

@item

Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

@item

Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

@item

Convey individual copies of the object code with a copy of the written offer

to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

@item

Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports

equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

@item

Convey the object

code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

@end enumerate

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction

is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

@item Additional Terms.

“Additional permissions” are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

@enumerate a

@item

Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or

@item

Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or

@item

Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or

@item

Limiting the use for publicity purposes of names of licensors or authors of the material; or

@item

Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks;
or

@item

Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

@end enumerate

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the

above requirements apply either way.

@item Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

@item Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

@item Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible

for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give

under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

@item Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party

means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. ``Knowingly relying'' means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is ``discriminatory'' if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

@item No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms

that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

@item Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

@item Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of

your choosing to follow a
later version.

@item Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM ``AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

@item Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT

LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@item Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

@end enumerate

@heading END OF TERMS AND CONDITIONS

@heading How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To

do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the ``copyright" line and a pointer to where the full notice is found.

@smallexample

@var{one line to give the program's name and a brief idea of what it does.}

Copyright (C) @var{year} @var{name of author}

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If

not, see @url{http://www.gnu.org/licenses/}.

@end smallexample

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

@smallexample

@var{program} Copyright (C) @var{year} @var{name of author}

This program comes with ABSOLUTELY NO WARRANTY; for details type @samp{show w}.

This is free software, and you are welcome to redistribute it under certain conditions; type @samp{show c} for details.

@end smallexample

The hypothetical commands @samp{show w} and @samp{show c} should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an ``about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a ``copyright disclaimer" for the program, if necessary.

For more information on this, and how to apply and follow the GNU GPL, see

@url{http://www.gnu.org/licenses/}.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read [@url{http://www.gnu.org/philosophy/why-not-lgpl.html}](http://www.gnu.org/philosophy/why-not-lgpl.html).

@c man end

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis

or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many

libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE

TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated

straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility

is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any

executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)
- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are

prohibited by law if you do not accept this License. Therefore, by modifying
or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute
so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many
people have made
generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR

CONSEQUENTIAL

DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This library is free software; you can redistribute it and/or  
modify it under the terms of the GNU Lesser General Public  
License as published by the Free Software Foundation; either  
version 2.1 of the License, or (at your option) any later version.
```

```
This library is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU  
Lesser General Public License for more details.
```

```
You should have received a copy of the GNU Lesser General Public  
License along with this library; if not, write to the Free Software  
Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
```

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!
Boost Software License - Version 1.0 - August 17th, 2003

Permission is hereby granted, free of charge, to any person or organization obtaining a copy of the software and accompanying documentation covered by this license (the "Software") to use, reproduce, display, distribute, execute, and transmit the Software, and to prepare derivative works of the Software, and to permit third-parties to whom the Software is furnished to do so, all subject to the following:

The copyright notices in the Software and this entire statement, including the above license grant, this restriction and the following disclaimer, must be included in all copies of the Software, in whole or in part, and all derivative works of the Software, unless such copies or derivative works are solely in the form of machine-executable object code generated by a source language processor.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS

FOR A PARTICULAR PURPOSE, TITLE AND NON-INFRINGEMENT. IN NO EVENT SHALL THE COPYRIGHT HOLDERS OR ANYONE DISTRIBUTING THE SOFTWARE BE LIABLE FOR ANY DAMAGES OR OTHER LIABILITY, WHETHER IN CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by

the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which

contains

a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies
of the Program's

source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide

a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or

executable form with such
an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number

of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GCC RUNTIME LIBRARY EXCEPTION

Version 3.1, 31 March 2009

Copyright (C) 2009 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

This GCC Runtime Library Exception ("Exception") is an additional permission under section 7 of the GNU General Public License, version 3 ("GPLv3"). It applies to a given file (the "Runtime Library") that bears a notice placed by the copyright holder of the file stating that the file is governed by GPLv3 along with this Exception.

When you use GCC to compile a program, GCC may combine portions of certain GCC header files and runtime libraries with the compiled program. The purpose of this Exception is to allow compilation of non-GPL (including proprietary) programs to use, in this way, the header files and runtime libraries covered by this Exception.

0. Definitions.

A file is an "Independent Module" if it either requires the Runtime Library for execution after a Compilation Process, or makes use of an interface provided by the Runtime Library, but is not otherwise based on the Runtime Library.

"GCC" means a version of the GNU Compiler Collection, with or without modifications, governed by version 3 (or a specified later version) of the GNU General Public License (GPL) with the option of using any subsequent versions published by the FSF.

"GPL-compatible Software" is software whose conditions of propagation, modification and use would permit combination with GCC in accord with the license of GCC.

"Target Code" refers to output from any compiler for a real or virtual target processor architecture, in executable form or suitable for input to an assembler, loader, linker and/or execution phase. Notwithstanding that, Target Code does not include data in any

format that is used as a compiler intermediate representation, or used for producing a compiler intermediate representation.

The "Compilation Process" transforms code entirely represented in non-intermediate languages designed for human-written code, and/or in Java Virtual Machine byte code, into Target Code. Thus, for example, use of source code generators and preprocessors need not be considered part of the Compilation Process, since the Compilation Process can be understood as starting with the output of the generators or preprocessors.

A Compilation Process is "Eligible" if it is done using GCC, alone or with other GPL-compatible software, or if it is done without using any work based on GCC. For example, using non-GPL-compatible Software to optimize any GCC intermediate representations would not qualify as an Eligible Compilation Process.

1. Grant of Additional Permission.

You have permission to propagate a work of Target Code formed by combining the Runtime Library with Independent Modules, even if such propagation would otherwise violate the terms of GPLv3, provided that all Target Code was generated by Eligible Compilation Processes. You may then convey such a combination under terms of your choice, consistent with the licensing of the Independent Modules.

2. No Weakening of GCC Copyleft.

The availability of this Exception does not imply any general presumption that third-party software is unaffected by the copyleft requirements of the license of GCC.

This is an attempt to acknowledge early contributions to the garbage collector. Later contributions should instead be mentioned in README.changes.

HISTORY -

Early versions of this collector were developed as a part of research projects supported in part by the National Science Foundation and the Defense Advance Research Projects Agency.

The garbage collector originated as part of the run-time system for the Russell programming language implementation. The first version of the garbage collector was written primarily by Al Demers. It was then refined and mostly rewritten, primarily by Hans-J. Boehm, at Cornell U., the University of Washington, Rice University (where it was first used for

C and assembly code), Xerox PARC, SGI, and HP Labs. However, significant contributions have also been made by many others.

Some other contributors:

More recent contributors are mentioned in the modification history in README.changes. My apologies for any omissions.

The SPARC specific code was

originally contributed by Mark Weiser.

The Encore Multimax modifications were supplied by

Kevin Kenny (kenny@m.cs.uiuc.edu). The adaptation to the IBM PC/RT is largely due to Vernon Lee, on machines made available to Rice by IBM.

Much of the HP specific code and a number of good suggestions for improving the generic code are due to Walter Underwood.

Robert Brazile (brazile@diamond.bbn.com) originally supplied the ULTRIX code.

Al Dosser (dosser@src.dec.com) and Regis Cridlig (Regis.Cridlig@cl.cam.ac.uk) subsequently provided updates and information on variation between ULTRIX systems. Parag Patel (parag@netcom.com) supplied the A/UX code.

Jesper Peterson(jep@mtiame.mtia.oz.au), Michel Schinz, and

Martin Tauchmann (martintauchmann@bigfoot.com) supplied the Amiga port.

Thomas Funke (thf@zelator.in-berlin.de(?)) and

Brian D.Carlstrom (bdc@clark.lcs.mit.edu) supplied the NeXT ports.

Douglas Steel (doug@wg.icl.co.uk) provided ICL DRS6000 code.

Bill Janssen (janssen@parc.xerox.com) supplied

the SunOS dynamic loader

specific code. Manuel Serrano (serrano@cornas.inria.fr) supplied linux and

Sony News specific code. Al Dosser provided Alpha/OSF/1 code. He and

Dave Detlefs(detlefs@src.dec.com) also provided several generic bug fixes.

Alistair G. Crooks(agg@uts.amdahl.com) supplied the NetBSD and 386BSD ports.

Jeffrey Hsu (hsu@soda.berkeley.edu) provided the FreeBSD port.

Brent Benson (brent@jade.ssd.csd.harris.com) ported the collector to

a Motorola 88K processor running CX/UX (Harris NightHawk).

Ari Huttunen (Ari.Huttunen@hut.fi) generalized the OS/2 port to

nonIBM development environments (a nontrivial task).

Patrick Beard (beard@cs.ucdavis.edu) provided the initial MacOS port.

David Chase, then at Olivetti Research, suggested several improvements.

Scott Schwartz (schwartz@groucho.cse.psu.edu) supplied some of the code to save and print call stacks for leak detection on a SPARC.

Jesse Hull and John Ellis supplied the C++ interface code.

Zhong Shao performed much of the

experimentation that led to the

current typed allocation facility. (His dynamic type inference code hasn't made it into the released version of the collector, yet.)

@ignore

@c Set file name and title for man page.

@setfilename gpl

@settitle GNU General Public License

@c man begin SEEALSO

gfdl(7), fsf-funding(7).

@c man end

@c man begin COPYRIGHT

Copyright @copyright{ } 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

@c man end

@end ignore

@node Copying

@c man begin DESCRIPTION

@unnumbered GNU GENERAL PUBLIC LICENSE

@center Version 2, June 1991

@c This file is intended to be included in another file.

@display

Copyright @copyright{ } 1989, 1991 Free Software Foundation, Inc.

51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

@end display

@unnumberedsec Preamble

The licenses for most software are designed to take away your
freedom to share and change
it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software---to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to
using it. (Some other Free Software Foundation software is covered by
the GNU Library General Public License instead.) You can apply it to
your programs, too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
this service if you wish), that you receive source code or can get it
if you want it, that you can change the software or use pieces of it
in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid
anyone to deny you these rights or to ask

you to surrender the rights.

These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

@iftex

@unnumberedsec TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@end iftex

@ifnottex

@center TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@end ifnottex

@enumerate 0

@item

This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The ``Program'', below, refers to any such program or work, and a ``work based on the Program'' means either the Program or any derivative work under copyright law: that

is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in

the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

@item

You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and
give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

@item

You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

@enumerate a

@item

You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

@item

You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

@item

If the modified program normally reads commands interactively when run, you must cause it, when started running for
such
interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this

License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

@end enumerate

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this

License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

@item

You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

@enumerate a

@item

Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

@item

Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

@item

Accompany it with the information you received as to the offer

to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

@end enumerate

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts

used to

control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

@item

You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

@item

You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

@item

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to

these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein.

You

are not responsible for enforcing compliance by third parties to this License.

@item

If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

@item

If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright

holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates

the limitation as if written in the body of this License.

@item

The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and ``any later version'', you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

@item

If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

@iftex

@heading NO WARRANTY

@end iftex

@ifnottex

@center NO WARRANTY

@end ifnottex

@item

BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM ``AS IS'' WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

@item

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR

REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@end enumerate

@iftex

@heading END OF TERMS AND CONDITIONS

@end iftex

@ifnottex

@center END OF TERMS AND CONDITIONS

@end ifnottex

@page

@unnumberedsec Appendix: How to Apply
These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the ``copyright" line and a pointer to where the full notice is found.

@smallexample

@var{one line to give the program's name and a brief idea of what it does.}

Copyright (C) @var{year} @var{name of author}

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY;
without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the
GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

@end smallexample

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
@smallexample
Gnomovision version 69, Copyright (C) @var{year} @var{name of author}
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details
type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
@end smallexample
```

The hypothetical commands @samp{show w} and @samp{show c} should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than @samp{show w} and @samp{show c}; they could even be mouse-clicks or menu items---whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a ``copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
@example
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.

@var{signature of Ty Coon}, 1 April 1989
Ty Coon, President of Vice
@end example
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

```
@c man end
```

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is

modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free

programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not

covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.
^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by

this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2)

will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies

the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined

with any other library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited

by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein.

You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time.

Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library.

It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

The software in this package is distributed under the GNU General Public License (with a special exception described below).

A copy of GNU General Public License (GPL) is included in this distribution, in the file COPYING. If you do not have the source code, it is available at:

<http://www.gnu.org/software/classpath/>

Linking this library statically or dynamically with other modules is making a combined work based on this library. Thus, the terms and conditions of the GNU General Public License cover the whole combination.

As a special exception, the copyright holders of this library give you permission to link this library with independent modules to produce an executable, regardless of the license terms of these independent modules, and to copy and distribute the resulting executable under terms of your choice, provided that you also meet, for each linked independent module, the terms and conditions of the license of that module. An independent module is a module which is not derived from or based on this library. If you modify this library, you may extend this exception to your version of the library, but you are not obligated to do so. If you do not wish to do so, delete this exception statement from your version.

GNU Classpath also contains other (example) code distributed under other terms. External libraries included with GNU Classpath may also be distributed under different licensing terms.

The location and the exact terms of this other code is mentioned below.

Directory examples.

All example code is distributed under the GNU General Public License (GPL).

Each example source code files carries the following notice:

GNU Classpath examples are free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2, or (at your option) any later version.

GNU Classpath examples are distributed in the hope that they will be

useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU

General Public License for more details.

You should have received a copy of the GNU General Public License along with GNU Classpath examples; see the file COPYING. If not, write to the Free Software Foundation, 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.

For more information see the README file in the examples directory.

Directory native/fdlibm

fdlibm contains general algorithms useful for runtimes and compilers to support strict double and float mathematical operations.

fdlibm files carry the following notices:

Copyright (c) 1991 by AT&T.

Permission to use, copy, modify, and distribute this software for any purpose without fee is hereby granted, provided that this entire notice is included in all copies of any software which is or includes a copy or modification of this software and in all copies of the supporting documentation for such software.

THIS SOFTWARE IS BEING PROVIDED "AS IS", WITHOUT ANY EXPRESS OR IMPLIED WARRANTY. IN PARTICULAR, NEITHER THE AUTHOR NOR AT&T MAKES ANY REPRESENTATION OR WARRANTY OF ANY KIND CONCERNING THE MERCHANTABILITY OF THIS SOFTWARE OR ITS FITNESS FOR ANY PARTICULAR PURPOSE.

Copyright (C) 1993 by Sun Microsystems, Inc. All rights reserved.

Developed at SunPro, a Sun Microsystems, Inc. business.
Permission to use, copy, modify, and distribute this software is freely granted, provided that this notice is preserved.

The upstream for fdlibm is libgcj (<http://gcc.gnu.org/java/>), they sync again with the 'real' upstream (<http://www.netlib.org/fdlibm/readme>).

The documentation of some of the files in org/ietf/jgss/ is derived from the text of RFC 2853: Generic Security Service API Version 2: Java Bindings. That document is covered under the following license notice:

Copyright (C) The Internet Society (2000). All Rights Reserved.

This document and translations of it may be copied and furnished to others, and derivative works that comment on or otherwise explain it or assist in its implementation may be prepared, copied, published and distributed, in whole or in part, without restriction of any kind, provided that the above copyright notice and this paragraph are included on all such copies and derivative works. However, this document itself may not be modified in any way, such as by removing the copyright notice or references to the Internet Society or other Internet organizations, except as needed for the purpose of developing Internet standards in which case the procedures for copyrights defined in the Internet Standards process must be followed, or as required to translate it into languages other than English.

The limited permissions granted above are perpetual and will not be revoked by the Internet Society or its successors or assigns.

This document and the information contained herein is provided on an "AS IS" basis and THE INTERNET SOCIETY AND THE INTERNET ENGINEERING TASK FORCE DISCLAIMS ALL WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO ANY WARRANTY THAT THE USE OF THE INFORMATION HEREIN WILL NOT INFRINGE ANY RIGHTS OR ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

Directory external/w3c_dom
Bindings for the Document Object Model (DOM) as published by the World Wide Web Consortium. All files are distributed under the following W3C Software Short Notice:

Copyright (c) 2004 World Wide Web Consortium,

(Massachusetts Institute of Technology, European Research Consortium for Informatics and Mathematics, Keio University). All Rights Reserved. This work is distributed under the W3C(r) Software License [1] in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.

[1] <http://www.w3.org/Consortium/Legal/2002/copyright-software-20021231>

Permission to copy, modify, and distribute this software and its documentation, with or without modification, for any purpose and without fee or royalty is hereby granted, provided that you include the following on ALL copies of the software and documentation or portions thereof, including modifications:

1. The full text of this NOTICE in a location viewable to users of the redistributed or derivative work.

2. Any pre-existing intellectual property disclaimers, notices, or terms and conditions. If none exist, the W3C Software Short Notice should be included (hypertext is preferred, text is permitted) within the body of any redistributed or derivative code.
3. Notice of any changes or modifications to the files, including the date changes were made. (We recommend you provide URIs to the location from which the code is derived.)

THIS SOFTWARE AND DOCUMENTATION IS PROVIDED "AS IS," AND COPYRIGHT HOLDERS MAKE NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO, WARRANTIES OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF THE SOFTWARE OR DOCUMENTATION WILL NOT INFRINGE ANY THIRD PARTY PATENTS, COPYRIGHTS, TRADEMARKS OR OTHER RIGHTS.

COPYRIGHT HOLDERS WILL NOT BE LIABLE FOR ANY DIRECT, INDIRECT, SPECIAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF ANY USE OF THE SOFTWARE OR DOCUMENTATION.

The name and trademarks of copyright holders may NOT be used in advertising or publicity pertaining to the software without specific, written prior permission. Title to copyright in this software and any associated documentation will at all times remain with copyright holders.

Directory external/sax

Simple API for XML, a standard application interface for processing XML.

All files are distributed with the following short notice:

NO WARRANTY! This class is in the Public Domain.

The www.saxproject.org explains:

Copyright Status

SAX is free!

In fact, it's not possible to own a license to SAX, since it's been placed in the public domain.

No Warranty

Because SAX is released to the public domain, there is no warranty for the design or for the software implementation, to the extent permitted by applicable law. Except when otherwise stated in writing the copyright holders and/or other parties provide SAX "as is" without warranty of any kind, either expressed or implied, including, but not

limited to, the implied warranties of merchantability and fitness for a particular purpose. The entire risk as to the quality and performance of SAX is with you. Should SAX prove defective, you assume the cost of all necessary servicing, repair or correction.

In no event unless required by applicable law or agreed to in writing will any copyright holder, or any other party who may modify and/or redistribute SAX, be liable to you for damages, including any general, special, incidental or consequential damages arising out of the use or inability to use SAX (including but not limited to loss of data or data being rendered inaccurate or losses sustained by you or third parties or a failure of the SAX to operate with any other programs), even if such holder or other party has been advised of the possibility of such damages.

Copyright Disclaimers

This page includes statements to that effect by David Megginson, who would have been able to claim copyright for the original work.

SAX 1.0

Version 1.0 of the Simple API for XML (SAX), created collectively by the membership of the XML-DEV mailing list, is hereby released into the public domain.

No one owns SAX: you may use it freely in both commercial and non-commercial applications, bundle it with your software distribution, include it on a CD-ROM, list the source code in a book, mirror the documentation at your own web site, or use it in any other way you see fit.

David Megginson,
sax@megginson.com
1998-05-11

SAX 2.0

I hereby abandon any property rights to SAX 2.0 (the Simple API for XML), and release all of the SAX 2.0 source code, compiled code, and documentation contained in this distribution into the Public Domain. SAX comes with NO WARRANTY or guarantee of fitness for any purpose.

David Megginson, david@megginson.com
2000-05-05

Two files in gnu/xml/aelfred2 (SAXDriver.java and XmlParser.java) were originally derived from code which carried the following notice:

Copyright (c) 1997, 1998 by Microstar Software Ltd.

AElfired is free for both commercial and non-commercial use and redistribution, provided that Microstar's copyright and disclaimer are retained intact. You are free to modify AElfired for your own use and to redistribute AElfired with your modifications, provided that the modifications are clearly documented.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of merchantability or fitness for a particular purpose. Please use it AT YOUR OWN RISK.

The files in resource/gnu/java/locale were generated by gnu.localegen from the files distributed from date provided by CLDR. All these files are distributed under the following terms:

Copyright (C) 1991-2005 Unicode, Inc. All rights reserved. Distributed under the Terms of Use in <http://www.unicode.org/copyright.html>.

Permission is hereby granted, free of charge, to any person obtaining a copy of the Unicode data files and any associated documentation (the "Data Files") or Unicode software and any associated documentation (the "Software") to deal in the Data Files or Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, and/or sell copies of the Data Files or Software, and to permit persons to whom the Data Files or Software are furnished to do so, provided that (a) the above copyright notice(s) and this permission notice appear with all copies of the Data Files or Software, (b) both the above copyright notice(s) and this permission notice appear in associated documentation, and (c) there is clear notice in each modified Data File or in the Software as well as in the documentation associated with the Data File(s) or Software that the data or software has been modified.

THE DATA FILES AND SOFTWARE ARE PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT OF THIRD PARTY RIGHTS. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR HOLDERS INCLUDED IN THIS NOTICE BE LIABLE FOR ANY CLAIM, OR ANY SPECIAL INDIRECT OR CONSEQUENTIAL DAMAGES, OR ANY DAMAGES

WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THE DATA FILES OR SOFTWARE.

Except as contained in this notice, the name of a copyright holder shall not be used in advertising or otherwise to promote the sale, use or other dealings in these Data Files or Software without prior written authorization of the copyright holder.

The file `native/jni/midi-dssi/gnu_javax_sound_midi_dssi_DSSISynthesizer.c` contains two functions (`get_port_default` and `set_control`) derived from example code in the DSSI distribution (<http://dssi.sourceforge.net>). The original DSSI example code is distributed under the following terms:

Copyright 2004 Chris Cannam, Steve Harris and Sean Bolton.

Permission to use, copy, modify, distribute, and sell this software for any purpose is hereby granted without fee, provided that the above copyright notice and this permission notice are included in all copies or substantial portions of the software.

The files in `java/util/concurrent` and subdirectories (with the exception of `CopyOnWriteArrayList.java`), along with `java.util.NavigableMap`, `java.util.NavigableSet`, `java.util.Deque` and `java.util.ArrayDeque`, are taken from JSR166 concurrency materials maintained by Doug Lea and distributed under the following terms:

Written by Doug Lea with assistance from members of JCP JSR-166 Expert Group and released to the public domain, as explained at <http://creativecommons.org/licenses/publicdomain>

`CopyOnWriteArrayList.java` has been reimplemented for GNU Classpath, and is distributed under the same terms as other GNU Classpath files, as specified at the top of this file.

Directory `external/relaxngDatatype`
RELAX NG Pluggable Datatype Libraries. All files are distributed under the following notice:

Copyright (c) 2001, Thai Open Source Software Center Ltd, Sun Microsystems. All rights reserved.

Redistribution and use in source and binary forms, with or

without
modification, are permitted provided that the following
conditions
are met:

Redistributions of source code must retain the above
copyright
notice, this list of conditions and the following
disclaimer.

Redistributions in binary form must reproduce the above
copyright notice, this list of conditions and the following
disclaimer in the documentation and/or other materials
provided
with the distribution.

Neither the names of the copyright holders nor the names of
its
contributors may be used to endorse or promote products
derived
from this software without specific prior written
permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND
CONTRIBUTORS
"AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT
NOT
LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND
FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT

SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT,
INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF
SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR
BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF
LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT
(INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF
THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

* m4/ax_func_which_gethostbyname_r.m4

Copyright 2005 Caolan McNamara <caolan@skynet.ie>
Copyright 2005 Daniel Richard G. <skunk@iskunk.org>

This program is free software; you can redistribute it and/or modify
it under the terms of the GNU General Public License as published by

the Free Software Foundation; either version 2 of the License, or
(at your option) any later version.

This program is distributed in the hope
that it will be useful, but
WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
General Public License for more details.

You should have received a copy of the GNU General Public License
along with this program; if not, write to the Free Software
Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307,
USA.

As a special exception, the respective Autoconf Macro's copyright
owner gives unlimited permission to copy, distribute and modify the
configure scripts that are the output of Autoconf when processing the
Macro. You need not follow the terms of the GNU General Public License
when using or distributing such scripts, even though portions of the
text of the Macro appear in them. The GNU General Public License
(GPL) does govern all other use of the material that constitutes the
Autoconf Macro.

This special exception to the GPL applies to versions of the
Autoconf Macro
released by the Autoconf Macro Archive. When you make
and distribute a modified version of the Autoconf Macro, you may
extend this special exception to the GPL to apply to your modified
version as well.
Copyright (c) 2001, Thai Open Source Software Center Ltd, Sun Microsystems.
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions are
met:

Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.

Redistributions in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in
the documentation and/or other materials provided with the
distribution.

Neither the names of the copyright holders nor the names of its
contributors may be used to endorse or promote products derived
from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A

PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same

freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees"

and

"recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that

Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of

your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section

7. This requirement modifies the requirement in section 4 to

"keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical

medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option

remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating

where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights

granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting

any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

@node Library Copying
@appendixsec GNU LESSER GENERAL PUBLIC LICENSE

@cindex LGPL, Lesser General Public License
@center Version 2.1, February 1999

@display
Copyright © 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street - Fifth Floor, Boston, MA 02110-1301, USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts
as the successor of the GNU Library Public License, version 2, hence the
version number 2.1.]
@end display

@appendixsubsec Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software---to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some
specially designated software---typically libraries---of
the Free
Software Foundation and other authors who decide to use it. You can use
it too, but we suggest you first think carefully about whether this
license or the ordinary General Public License is the better strategy to
use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use,
not price. Our General Public Licenses are designed to make sure that
you have the freedom to distribute copies of free software (and charge
for this service if you wish); that you receive source code or can get
it if you want it; that you can change the software and use pieces of it
in new free programs; and that you are informed that you can do these
things.

To protect your rights, we need to make restrictions that forbid
distributors to deny you these rights or to ask you to surrender these
rights. These restrictions translate to certain responsibilities for
you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis
or for a fee, you must give the recipients all the rights that we gave

you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library.

The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the @dfn{Lesser} General Public License because it does @emph{Less} to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a ``work based on the library" and a ``work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

@iftex

@appendixsubsec TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@end iftex

@ifinfo

@center GNU LESSER GENERAL PUBLIC LICENSE

@center TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@end ifinfo

@enumerate 0

@item

This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called ``this License"). Each licensee is addressed as ``you".

A ``library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means

either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

@item

You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

@item

You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

@enumerate a

@item

The modified work must itself be a software library.

@item

You must cause

the files modified to carry prominent notices
stating that you changed the files and the date of any change.

@item

You must cause the whole of the work to be licensed at no
charge to all third parties under the terms of this License.

@item

If a facility in the modified Library refers to a function or a
table of data to be supplied by an application program that uses
the facility, other than as an argument passed when the facility
is invoked, then you must make a good faith effort to ensure that,
in the event an application does not supply such function or
table, the facility still operates, and performs whatever part of
its purpose remains meaningful.

(For example, a function in a library to compute square roots has
a purpose that is entirely well-defined independent of the
application. Therefore, Subsection 2d requires that any
application-supplied function or table used by this function must
be optional: if the application does not supply it, the square
root function must still
compute square roots.)

@end enumerate

These requirements apply to the modified work as a whole. If
identifiable sections of that work are not derived from the Library,
and can be reasonably considered independent and separate works in
themselves, then this License, and its terms, do not apply to those
sections when you distribute them as separate works. But when you
distribute the same sections as part of a whole which is a work based
on the Library, the distribution of the whole must be on the terms of
this License, whose permissions for other licensees extend to the
entire whole, and thus to each and every part regardless of who wrote
it.

Thus, it is not the intent of this section to claim rights or contest
your rights to work written entirely by you; rather, the intent is to
exercise the right to control the distribution of derivative or
collective works based on the Library.

In addition, mere aggregation of another work not based on the Library
with the Library (or with a work
based on the Library) on a volume of
a storage or distribution medium does not bring the other work under
the scope of this License.

@item

You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

@item

You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

@item

A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file

that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work.

(Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

@item

As an exception to the Sections above, you may also combine or link a ``work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

@enumerate a

@item

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable ``work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application

to use the modified definitions.)

@item

Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

@item

Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

@item

If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

@item

Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

@end enumerate

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

@item

You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined

library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

@enumerate a

@item

Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

@item

Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

@end enumerate

@item

You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

@item

You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

@item

Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

@item

If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

@item

If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded.

In such case, this License incorporates the limitation as if written in the body of this License.

@item

The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and ``any later version'', you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

@item

If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

@iftex

@heading NO WARRANTY

@end iftex

@ifinfo

@center NO WARRANTY

@end ifinfo

@item

BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY ``AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

@item

IN

NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF

SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@end enumerate

@iftex

@heading END OF TERMS AND CONDITIONS

@end iftex

@ifinfo

@center END OF TERMS AND CONDITIONS

@end ifinfo

@page

@appendixsubsec How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the ``copyright" line and a pointer to where the full notice is found.

@smallexample

@var{one line to give the library's name and an idea of what it does.}

Copyright (C) @var{year} @var{name of author}

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.

@end smallexample

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a ``copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

```
@smallexample
Yoyodyne, Inc., hereby disclaims all copyright interest in the library
`Frob' (a library for tweaking knobs) written by James Random Hacker.
```

```
@var{signature of Ty Coon}, 1 April 1990
Ty Coon, President of Vice
@end smallexample
```

That's all there is to it!

GNU LESSER GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

This version of the GNU Lesser General Public License incorporates
the terms and conditions of version 3 of the GNU General Public
License, supplemented by the additional permissions listed below.

0. Additional Definitions.

As used herein, "this License" refers to version 3 of the GNU Lesser
General Public License, and the "GNU GPL" refers to version 3 of the GNU
General Public License.

"The Library" refers to a covered work governed by this License,
other than an Application or a Combined Work as defined below.

An "Application" is any work that makes use of an interface provided
by the Library, but which is not otherwise based on the Library.
Defining a subclass of a class defined by the Library is
deemed a mode
of using an interface provided by the Library.

A "Combined Work" is a work produced by combining or linking an
Application with the Library. The particular version of the Library
with which the Combined Work was made is also called the "Linked
Version".

The "Minimal Corresponding Source" for a Combined Work means the
Corresponding Source for the Combined Work, excluding any source code

for portions of the Combined Work that, considered in isolation, are based on the Application, and not on the Linked Version.

The "Corresponding Application Code" for a Combined Work means the object code and/or source code for the Application, including any data and utility programs needed for reproducing the Combined Work from the Application, but excluding the System Libraries of the Combined Work.

1. Exception to Section 3 of the GNU GPL.

You may convey a covered work under sections 3 and 4 of this License without being bound by section 3 of the GNU GPL.

2. Conveying Modified Versions.

If you modify a copy of the Library, and, in your modifications, a facility refers to a function or data to be supplied by an Application that uses the facility (other than as an argument passed when the facility is invoked), then you may convey a copy of the modified version:

- a) under this License, provided that you make a good faith effort to ensure that, in the event an Application does not supply the function or data, the facility still operates, and performs whatever part of its purpose remains meaningful, or
- b) under the GNU GPL, with none of the additional permissions of this License applicable to that copy.

3. Object Code Incorporating Material from Library Header Files.

The object code form of an Application may incorporate material from a header file that is part of the Library. You may convey such object code under terms of your choice, provided that, if the incorporated material is not limited to numerical parameters, data structure layouts and accessors, or small macros, inline functions and templates (ten or fewer lines in length), you do both of the following:

- a) Give prominent notice with each copy of the object code that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the object code with a copy of the GNU GPL and this license document.

4. Combined Works.

You may convey a Combined Work under terms of your choice that, taken together, effectively do not restrict modification of the portions of the Library contained in the Combined Work and reverse engineering for debugging such modifications, if you also do each of the following:

a) Give prominent notice with each copy of the Combined Work that the Library is used in it and that the Library and its use are covered by this License.

b) Accompany the Combined Work with a copy of the GNU GPL and this license document.

c) For a Combined Work that displays copyright notices during execution, include the copyright notice for the Library among these notices, as well as a reference directing the user to the copies of the GNU GPL and this license document.

d) Do one of the following:

0) Convey the Minimal Corresponding Source under the terms of this License, and the Corresponding Application Code in a form suitable for, and under terms that permit, the user to recombine or relink the Application with a modified version of the Linked Version to produce a modified Combined Work, in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.

1) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (a) uses at run time a copy of the Library already present on the user's computer system, and (b) will operate properly with a modified version of the Library that is interface-compatible with the Linked Version.

e) Provide Installation Information, but only if you would otherwise be required to provide such information under section 6 of the GNU GPL, and only to the extent that such information is necessary to install and execute a modified version of the Combined Work produced by recombining or relinking the Application with a modified version of the Linked Version. (If you use option 4d0, the Installation Information must accompany the Minimal Corresponding Source and Corresponding Application Code. If you use option 4d1, you must provide the Installation Information in the manner specified by section 6 of the GNU GPL

for conveying Corresponding Source.)

5. Combined Libraries.

You may place library facilities that are a work based on the Library side by side in a single library together with other library facilities that are not Applications and are not covered by this License, and convey such a combined library under terms of your choice, if you do both of the following:

- a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities, conveyed under the terms of this License.
- b) Give prominent notice with the combined library that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

6. Revised Versions of the GNU Lesser General Public License.

The Free Software Foundation may publish revised and/or new versions of the GNU Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library as you received it specifies that a certain numbered version of the GNU Lesser General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that published version or of any later version published by the Free Software Foundation. If the Library as you received it does not specify a version number of the GNU Lesser General Public License, you may choose any version of the GNU Lesser General Public License ever published by the Free Software Foundation.

If the Library as you received it specifies that a proxy can decide whether future versions of the GNU Lesser General Public License shall apply, that proxy's public statement of acceptance of any version is permanent authorization for you to choose that version for the Library.

1.235 pexpect 2.3-6.el6

1.235.1 Available under license :

Free, open source, and all that good stuff.
Pexpect Copyright (c) 2008 Noah Spurrier

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.236 procps 3.2.8-25.el6

1.236.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not

price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law:

that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any

associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you

may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the program's name and a brief idea of what it does.>

Copyright (C) 19yy <name of author>

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands

```
`show w' and `show c' should show the appropriate
parts of the General Public License. Of course, the commands you use may
be called something other than `show w' and `show c'; they could even be
mouse-clicks or menu items--whatever suits your program.
```

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's

complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of

this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In

addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a

work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever

changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany

the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system;

it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing

and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year>
<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public

License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.237 redhat-logos 60.0.14-12.el6.centos

1.237.1 Available under license :

The redhat-logos package (the "Package") contains image files which incorporate the CentOS trademark, and CentOS logo (the "Marks").

The CentOS Project grants you the right to use the Package during the normal operation of other software programs that call upon the Package. The CentOS Project grants to you the right and license to copy and redistribute the unaltered Package for both commercial and non-commercial purposes.

If you are rebranding or modifying the underlying distribution, or the Package, you must remove "the Marks" and rename the distribution something other than CentOS.

When redistributing using this license, the following applies:

1. The above copyright notice and this license are included with each copy you make, and they remain intact and are not altered, deleted, or

modified in any way;
2. You do not modify the appearance of any or all of the Logos in any manner; and
3. You do not use any or all of the Logos as, or as part of, a trademark, trade name, or trade identifier; or in any other fashion
except as set forth in this license.

NO WARRANTY. THIS PACKAGE IS PROVIDED "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE CENTOS PROJECT. BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS PACKAGE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

1.238 python-argparse 1.2.1-2.el6

1.238.1 Available under license :

argparse is (c) 2006-2009 Steven J. Bethard <steven.bethard@gmail.com>.

The argparse module was contributed to Python as of Python 2.7 and thus was licensed under the Python license. Same license applies to all files in the argparse package project.

For details about the Python License, please see doc/Python-License.txt.

History

Before (and including) argparse 1.1, the argparse package was licensed under Apache License v2.0.

After argparse 1.1, all project files from the argparse project were deleted due to license compatibility issues between Apache License 2.0 and GNU GPL v2.

The project repository then had a clean start with some files taken from Python 2.7.1, so definitely all files are under Python License now.

A. HISTORY OF THE SOFTWARE

=====

Python was created in the early 1990s by Guido van Rossum at Stichting Mathematisch Centrum (CWI, see <http://www.cwi.nl>) in the Netherlands

as a successor of a language called ABC. Guido remains Python's principal author, although it includes many contributions from others.

In 1995, Guido continued his work on Python at the Corporation for National Research Initiatives (CNRI, see <http://www.cnri.reston.va.us>) in Reston, Virginia where he released several versions of the software.

In May 2000, Guido and the Python core development team moved to BeOpen.com to form the BeOpen PythonLabs team. In October of the same year, the PythonLabs team moved to Digital Creations (now Zope Corporation, see <http://www.zope.com>). In 2001, the Python Software Foundation (PSF, see <http://www.python.org/psf/>) was formed, a non-profit organization created specifically to own Python-related Intellectual Property. Zope Corporation is a sponsoring member of the PSF.

All Python releases are Open Source (see <http://www.opensource.org> for the Open Source Definition). Historically, most, but not all, Python releases have also been GPL-compatible; the table below summarizes the various releases.

Release	Derived from	Year	Owner	GPL-compatible? (1)
0.9.0 thru 1.2		1991-1995	CWI	yes
1.3 thru 1.5.2	1.2	1995-1999	CNRI	yes
1.6	1.5.2	2000	CNRI	no
2.0	1.6	2000	BeOpen.com	no
1.6.1	1.6	2001	CNRI	yes (2)
2.1	2.0+1.6.1	2001	PSF	no
2.0.1	2.0+1.6.1	2001	PSF	yes
2.1.1	2.1+2.0.1	2001	PSF	yes
2.2	2.1.1	2001	PSF	yes
2.1.2	2.1.1	2002	PSF	yes
2.1.3				
2.1.2	2002	PSF	yes	
2.2.1	2.2	2002	PSF	yes
2.2.2	2.2.1	2002	PSF	yes
2.2.3	2.2.2	2003	PSF	yes
2.3	2.2.2	2002-2003	PSF	yes
2.3.1	2.3	2002-2003	PSF	yes
2.3.2	2.3.1	2002-2003	PSF	yes
2.3.3	2.3.2	2002-2003	PSF	yes
2.3.4	2.3.3	2004	PSF	yes
2.3.5	2.3.4	2005	PSF	yes
2.4	2.3	2004	PSF	yes

2.4.1	2.4	2005	PSF	yes
2.4.2	2.4.1	2005	PSF	yes
2.4.3	2.4.2	2006	PSF	yes
2.4.4	2.4.3	2006	PSF	yes
2.5	2.4	2006	PSF	yes
2.5.1	2.5	2007	PSF	yes
2.5.2	2.5.1	2008	PSF	yes
2.5.3	2.5.2	2008	PSF	yes
2.6	2.5	2008	PSF	yes
2.6.1	2.6	2008	PSF	yes
2.6.2	2.6.1	2009	PSF	yes
2.6.3	2.6.2	2009	PSF	yes
2.6.4	2.6.3	2009	PSF	yes
2.6.5	2.6.4	2010	PSF	yes
2.7	2.6	2010	PSF	yes

Footnotes:

(1) GPL-compatible doesn't mean that we're distributing Python under the GPL. All Python licenses, unlike the GPL, let you distribute a modified version without making your changes open source. The GPL-compatible licenses make it possible to combine Python with other software that is released under the GPL; the others don't.

(2) According to Richard Stallman, 1.6.1 is not GPL-compatible, because its license has a choice of law clause. According to CNRI, however, Stallman's lawyer has told CNRI's lawyer that 1.6.1 is "not incompatible" with the GPL.

Thanks to the many outside volunteers who have worked under Guido's direction to make these releases possible.

B. TERMS AND CONDITIONS FOR ACCESSING OR OTHERWISE USING PYTHON

PYTHON SOFTWARE FOUNDATION LICENSE VERSION 2

1. This LICENSE AGREEMENT is between the Python Software Foundation ("PSF"), and the Individual or Organization ("Licensee") accessing and otherwise using this software ("Python") in source or binary form and its associated documentation.

2. Subject to the terms and conditions of this License Agreement, PSF hereby grants Licensee a nonexclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works,

distribute, and otherwise use Python alone or in any derivative version, provided, however, that PSF's License Agreement and PSF's notice of copyright, i.e., "Copyright (c) 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008, 2009, 2010 Python Software Foundation; All Rights Reserved" are retained in Python alone or in any derivative version prepared by Licensee.

3. In the event Licensee prepares a derivative work that is based on or incorporates Python or any part thereof, and wants to make the derivative work available to others as provided herein, then Licensee hereby agrees to include in any such work a brief summary of the changes made to Python.

4. PSF is making Python available to Licensee on an "AS IS" basis. PSF MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, PSF MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF PYTHON WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

5. PSF SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF PYTHON FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF MODIFYING, DISTRIBUTING, OR OTHERWISE USING PYTHON, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

6. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

7. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between PSF and Licensee. This License Agreement does not grant permission to use PSF trademarks or trade name in a trademark sense to endorse or promote products or services of Licensee, or any third party.

8. By copying, installing or otherwise using Python, Licensee agrees to be bound by the terms and conditions of this License Agreement.

BEOPEN.COM LICENSE AGREEMENT FOR PYTHON 2.0

BEOPEN PYTHON OPEN SOURCE LICENSE AGREEMENT VERSION 1

1. This LICENSE AGREEMENT is between BeOpen.com ("BeOpen"), having an office at 160 Saratoga Avenue, Santa Clara, CA 95051, and the

Individual or Organization ("Licensee") accessing and otherwise using this software in source or binary form and its associated documentation ("the Software").

2. Subject to the terms and conditions of this BeOpen Python License Agreement, BeOpen hereby grants Licensee a non-exclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use the Software alone or in any derivative version, provided, however, that the BeOpen Python License is retained in the Software, alone or in any derivative version prepared by Licensee.

3. BeOpen is making the Software available to Licensee on an "AS IS" basis. BEOPEN MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, BEOPEN MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF THE SOFTWARE WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

4. BEOPEN SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF THE SOFTWARE FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF USING, MODIFYING OR DISTRIBUTING THE SOFTWARE, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

5. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

6. This License Agreement shall be governed by and interpreted in all respects by the law of the State of California, excluding conflict of law provisions. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between BeOpen and Licensee. This License Agreement does not grant permission to use BeOpen trademarks or trade names in a trademark sense to endorse or promote products or services of Licensee, or any third party. As an exception, the "BeOpen Python" logos available at <http://www.pythonlabs.com/logos.html> may be used according to the permissions granted on that web page.

7. By copying, installing or otherwise using the software, Licensee agrees to be bound by the terms and conditions of this License Agreement.

CNRI LICENSE AGREEMENT FOR PYTHON 1.6.1

1. This LICENSE AGREEMENT is between the Corporation for National Research Initiatives, having an office at 1895 Preston White Drive, Reston, VA 20191 ("CNRI"), and the Individual or Organization ("Licensee") accessing and otherwise using Python 1.6.1 software in source or binary form and its associated documentation.

2. Subject to the terms and conditions of this License Agreement, CNRI hereby grants Licensee a nonexclusive, royalty-free, world-wide license to reproduce, analyze, test, perform and/or display publicly, prepare derivative works, distribute, and otherwise use Python 1.6.1 alone or in any derivative version, provided, however, that CNRI's License

Agreement and CNRI's notice of copyright, i.e., "Copyright (c) 1995-2001 Corporation for National Research Initiatives; All Rights Reserved" are retained in Python 1.6.1 alone or in any derivative version prepared by Licensee. Alternately, in lieu of CNRI's License Agreement, Licensee may substitute the following text (omitting the quotes): "Python 1.6.1 is made available subject to the terms and conditions in CNRI's License Agreement. This Agreement together with Python 1.6.1 may be located on the Internet using the following unique, persistent identifier (known as a handle): 1895.22/1013. This Agreement may also be obtained from a proxy server on the Internet using the following URL: <http://hdl.handle.net/1895.22/1013>".

3. In the event Licensee prepares a derivative work that is based on or incorporates Python 1.6.1 or any part thereof, and wants to make the derivative work available to others as provided herein, then Licensee hereby agrees to include in any such work a brief summary of the changes made to Python 1.6.1.

4. CNRI is making Python 1.6.1 available to Licensee on an "AS IS" basis. CNRI MAKES NO REPRESENTATIONS OR WARRANTIES, EXPRESS OR IMPLIED. BY WAY OF EXAMPLE, BUT NOT LIMITATION, CNRI MAKES NO AND DISCLAIMS ANY REPRESENTATION OR WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE OR THAT THE USE OF PYTHON 1.6.1 WILL NOT INFRINGE ANY THIRD PARTY RIGHTS.

5. CNRI SHALL NOT BE LIABLE TO LICENSEE OR ANY OTHER USERS OF PYTHON 1.6.1 FOR ANY INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OR LOSS AS A RESULT OF MODIFYING, DISTRIBUTING, OR OTHERWISE USING PYTHON 1.6.1, OR ANY DERIVATIVE THEREOF, EVEN IF ADVISED OF THE POSSIBILITY THEREOF.

6. This License Agreement will automatically terminate upon a material breach of its terms and conditions.

7. This License Agreement shall be governed by the federal intellectual property law of the United States, including without

limitation the federal copyright law, and, to the extent such U.S.

federal law does not apply, by the law of the Commonwealth of Virginia, excluding Virginia's conflict of law provisions.

Notwithstanding the foregoing, with regard to derivative works based on Python 1.6.1 that incorporate non-separable material that was previously distributed under the GNU General Public License (GPL), the law of the Commonwealth of Virginia shall govern this License Agreement only as to issues arising under or with respect to Paragraphs 4, 5, and 7 of this License Agreement. Nothing in this License Agreement shall be deemed to create any relationship of agency, partnership, or joint venture between CNRI and Licensee. This License Agreement does not grant permission to use CNRI trademarks or trade name in a trademark sense to endorse or promote products or services of Licensee, or any third party.

8. By clicking on the "ACCEPT" button where indicated, or by copying, installing or otherwise using Python 1.6.1, Licensee agrees to be bound by the terms and conditions of this License Agreement.

ACCEPT

CWI LICENSE AGREEMENT FOR PYTHON 0.9.0 THROUGH 1.2

Copyright (c) 1991 - 1995, Stichting Mathematisch Centrum Amsterdam, The Netherlands. All rights reserved.

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Stichting Mathematisch Centrum or CWI not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

STICHTING MATHEMATISCH CENTRUM DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL STICHTING MATHEMATISCH CENTRUM BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

1.239 fontconfig 2.10.95

1.239.1 Available under license :

fontconfig/COPYING

Copyright 2000,2001,2002,2003,2004,2006,2007 Keith Packard

Copyright 2005 Patrick Lam

Copyright 2009 Roozbeh Pournader

Copyright 2008,2009 Red Hat, Inc.

Copyright 2008 Danilo Egan

Copyright 2012 Google, Inc.

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of the author(s) not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. The authors make no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

THE AUTHOR(S) DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL

THE AUTHOR(S) BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

1.240 gnutls 3.3.8

1.240.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence

the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be

introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating

system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) The modified work must itself be a software library.

b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves,

then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License.

Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot

use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues),

conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute

so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and

conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin St, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE
Version 3, 29 June 2007

Copyright (C) 1992-2014 by Bruce Korb - all rights reserved
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for

software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps: (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those

products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding

Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by

this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice; keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code; keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users

beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a

network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or

e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have

received notice of violation of this License (for any work) from that copyright holder,
and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties

receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work,
then the patent license
you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or
that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD

PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17. Interpretation
of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) by Bruce Korb - all rights reserved
```

```
This program is free software: you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation, either version 3 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program. If not, see <http://www.gnu.org/licenses/>.
```

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) by Bruce Korb - all rights reserved
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <<http://www.gnu.org/philosophy/why-not-lgpl.html>>. Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of the author may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE

POSSIBILITY OF SUCH DAMAGE.

=====
Written by Andy Polyakov <appro@fy.chalmers.se> for the OpenSSL
project. The module is, however, dual licensed under OpenSSL and
CRYPTOGAMS licenses depending on where you obtain it. For further
details see <http://www.openssl.org/~appro/cryptogams/>.
=====

Copyright (c) 2006-2012, CRYPTOGRAMS by <appro@openssl.org>
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

* Redistributions of source code must retain copyright notices,
this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above
copyright notice, this list of conditions and the following
disclaimer in the documentation and/or other materials
provided with the distribution.

* Neither the name of the CRYPTOGRAMS nor
the names of its
copyright holder and contributors may be used to endorse or
promote products derived from this software without specific
prior written permission.

ALTERNATIVELY, provided that this notice is retained in full, this
product may be distributed under the terms of the GNU General Public
License (GPL), in which case the provisions of the GPL apply INSTEAD OF
those given above.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDER AND CONTRIBUTORS
"AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT
LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR
A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT
OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL,
SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT
LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE,
DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY
THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY,
OR TORT
(INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE
OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

#####

Constant-time SSSE3 AES core implementation.

version 0.1

##

By Mike Hamburg (Stanford University), 2009

Public domain.

##

For details see http://shiftright.org/papers/vector_aes/ and

<http://crypto.stanford.edu/vpaes/>.

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1)

assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The "System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component

(kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under

the conditions stated below. Sublicensing is not allowed;
section 10
makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately
publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any
non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all
recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to
"keep intact all notices".

c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.

d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the

Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization

keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own

removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or
- f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent

(such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this

License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any

author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least

the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <http://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <http://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <http://www.gnu.org/philosophy/why-not-lgpl.html>.

GNU LESSER GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 1992-2014 by Bruce Korb - all rights reserved
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

This version of the GNU Lesser General Public License incorporates
the terms and conditions of version 3 of the GNU General Public
License, supplemented by the additional permissions listed below.

0. Additional Definitions.

As used herein, "this License" refers to version 3 of the GNU Lesser
General Public License, and the "GNU GPL" refers to version 3 of the GNU
General Public License.

"The Library" refers to a covered work governed by this License,
other than an Application or a Combined Work as defined below.

An "Application" is any work that makes use of an interface provided
by the Library, but which is not otherwise based on the Library.
Defining a subclass of a class defined by the Library is deemed
a mode
of using an interface provided by the Library.

A "Combined Work" is a work produced by combining or linking an
Application with the Library. The particular version of the Library
with which the Combined Work was made is also called the "Linked
Version".

The "Minimal Corresponding Source" for a Combined Work means the
Corresponding Source for the Combined Work, excluding any source code
for portions of the Combined Work that, considered in isolation, are
based on the Application, and not on the Linked Version.

The "Corresponding Application Code" for a Combined Work means the
object code and/or source code for the Application, including any data
and utility programs needed for reproducing the Combined Work from the
Application, but excluding the System Libraries of the Combined Work.

1. Exception to Section 3 of the GNU GPL.

You may convey a covered work under sections 3 and 4 of this License
without being bound by section 3 of the GNU GPL.

2. Conveying Modified Versions.

If you modify a copy of the Library, and, in your modifications, a facility refers to a function or data to be supplied by an Application that uses the facility (other than as an argument passed when the facility is invoked), then you may convey a copy of the modified version:

- a) under this License, provided that you make a good faith effort to ensure that, in the event an Application does not supply the function or data, the facility still operates, and performs whatever part of its purpose remains meaningful, or
- b) under the GNU GPL, with none of the additional permissions of this License applicable to that copy.

3. Object Code Incorporating Material from Library Header Files.

The object code form of an Application may incorporate material from a header file that is part of the Library. You may convey such object code under terms of your choice, provided that, if the incorporated material is not limited to numerical parameters, data structure layouts and accessors, or small macros, inline functions and templates (ten or fewer lines in length), you do both of the following:

- a) Give prominent notice with each copy of the object code that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the object code with a copy of the GNU GPL and this license document.

4. Combined Works.

You may convey a Combined Work under terms of your choice that, taken together, effectively do not restrict modification of the portions of the Library contained in the Combined Work and reverse engineering for debugging such modifications, if you also do each of the following:

- a) Give prominent notice with each copy of the Combined Work that the Library is used in it and that the Library and its use are covered by this License.
- b) Accompany the Combined Work with a copy of the GNU GPL and this license document.
- c) For a Combined Work that displays copyright notices

during

execution, include the copyright notice for the Library among these notices, as well as a reference directing the user to the copies of the GNU GPL and this license document.

d) Do one of the following:

0) Convey the Minimal Corresponding Source under the terms of this License, and the Corresponding Application Code in a form suitable for, and under terms that permit, the user to recombine or relink the Application with a modified version of the Linked Version to produce a modified Combined Work, in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.

1) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (a) uses at run time a copy of the Library already present on the user's computer system, and (b) will operate properly with a modified version of the Library that is interface-compatible with the Linked Version.

e) Provide Installation Information, but only if you would otherwise be required to provide such information under section 6 of the GNU GPL, and only to the extent that such information is necessary to install and execute a modified version of the Combined Work produced by recombining or relinking the Application with a modified version of the Linked Version. (If you use option 4d0, the Installation Information must accompany the Minimal Corresponding Source and Corresponding Application Code. If you use option 4d1, you must provide the Installation Information in the manner specified by section 6 of the GNU GPL for conveying Corresponding Source.)

5. Combined Libraries.

You may place library facilities that are a work based on the Library side by side in a single library together with other library facilities that are not Applications and are not covered by this License, and convey such a combined library under terms of your choice, if you do both of the following:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities, conveyed under the terms of this License.

b) Give prominent notice with the combined library that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

6. Revised Versions of the GNU Lesser General Public License.

The Free Software Foundation may publish revised and/or new versions of the GNU Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library as you received it specifies that a certain numbered version of the GNU Lesser General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that published version or of any later version published by the Free Software Foundation. If the Library as you received it does not specify a version number of the GNU Lesser General Public License, you may choose any version of the GNU Lesser General Public License ever published by the Free Software Foundation.

If the Library as you received it specifies that a proxy can decide whether future versions of the GNU Lesser General Public License shall apply, that proxy's public statement of acceptance of any version is permanent authorization for you to choose that version for the Library.

1.241 libtasn 3.8

1.241.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public

Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a

restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an

appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote

it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary
GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked

with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined

library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any

other library

facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if

you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse

you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you

may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free

programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision

will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey

the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990

Ty Coon, President of Vice

That's all there is to it!

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<http://fsf.org/>>

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free

software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

- (1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents.

States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices" to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the

work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately

publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any
non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all
recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey,
and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to
produce it from the Program, in the form of source code under the
terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified
it, and giving a relevant date.

- b) The work must carry prominent notices stating that it is
released under this License and any conditions added under section
7. This requirement modifies the requirement in section
4 to
"keep intact all notices".

- c) You must license the entire work, as a whole, under this
License to anyone who comes into possession of a copy. This
License will therefore apply, along with any applicable section 7
additional terms, to the whole of the work, and all its parts,
regardless of how they are packaged. This License gives no
permission to license the work in any other way, but it does not
invalidate such permission if you have separately received it.

- d) If the work has interactive user interfaces, each must display
Appropriate Legal Notices; however, if the Program has interactive
interfaces that do not display Appropriate Legal Notices, your
work need not make them do so.

A compilation of a covered work with other separate and independent
works, which are not by their nature extensions of the covered work,
and which are not combined with it such as to form a larger program,
in or on a volume of a storage or distribution
medium, is called an
"aggregate" if the compilation and its resulting copyright are not
used to limit the access or legal rights of the compilation's users
beyond what the individual works permit. Inclusion of a covered work
in an aggregate does not cause this License to apply to the other
parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

- a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.
- b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.
- c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.
- d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.
- e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no

charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or
- e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright

holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered

work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF

SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software: you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation, either version 3 of the License, or  
(at your option) any later version.
```

```
This program is distributed in the hope that it will be useful,  
but WITHOUT ANY WARRANTY; without even the implied warranty of  
MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the  
GNU General Public License for more details.
```

```
You should have received a copy of the GNU General Public License  
along with this program. If not, see <http://www.gnu.org/licenses/>.
```

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short notice like this when it starts in an interactive mode:

<program> Copyright (C) <year> <name of author>

This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.

This is free software, and you are welcome to redistribute it under certain conditions; type `show c' for details.

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary.

For more information on this, and how to apply and follow the GNU GPL, see <<http://www.gnu.org/licenses/>>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to

do, use the GNU Lesser General

Public License instead of this License. But first, please read

<<http://www.gnu.org/philosophy/why-not-lgpl.html>>.

@c The GNU Free Documentation License.

@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,

@c hence no sectioning command or @node.

@display

Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.

@uref{<http://fsf.org/>}

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other functional and useful document @dfn{free} in the sense of freedom: to assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative

works of the document

must themselves be free in the same sense. It complements the GNU General Public License, which is a copyleft license designed for free software.

We have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The ``Document'', below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as ``you''. You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A ``Modified Version'' of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A ``Secondary Section'' is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The ``Invariant Sections'' are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero

Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The ``Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A ``Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not ``Transparent" is called ``Opaque".

Examples of suitable formats for Transparent copies include plain ASCII without markup, Texinfo input format, $\text{La@TeX}\{ \}$ input format, SGML or XML using a publicly available DTD, and standard-conforming simple HTML, PostScript or PDF designed for human modification. Examples of transparent image formats include PNG, XCF and JPG@. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, SGML or XML for which the DTD and/or processing tools are not generally available, and the machine-generated HTML, PostScript or PDF produced by some word processors for output purposes only.

The ``Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, ``Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The ``publisher" means any person or entity that distributes copies of the Document to the public.

A section ``Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following

text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as ``Acknowledgements'', ``Dedications'', ``Endorsements'', or ``History''.) To ``Preserve the Title'' of such a section when you modify the Document means that it remains a section ``Entitled XYZ'' according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition. Copying with changes limited to the covers, as long as they preserve the title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material. If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute an Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements'' or ``Dedications'', Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or

dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements''. Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements'' or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant

Sections in the Modified Version's license notice.

These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements'', provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original author or publisher of that section if known, or else a unique number.

Make the same adjustment to the section titles in the list of Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History'' in the various original documents, forming one section Entitled ``History''; likewise combine any sections Entitled ``Acknowledgements'', and any sections Entitled ``Dedications''. You must delete all sections Entitled ``Endorsements''.

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents released under this License, and replace the individual copies of this License in the various documents with a single copy that is included in the collection, provided that you follow the rules of this License for verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute it individually under this License, provided you insert a copy of this License into the extracted document, and follow this License in all other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate and independent documents or works, in or on a volume of a storage or distribution medium, is called an ``aggregate'' if the copyright resulting from the compilation is not used to limit the legal rights

of the compilation's users beyond what the individual works permit. When the Document is included in an aggregate, this License does not apply to the other works in the aggregate which are not themselves derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these copies of the Document, then if the Document is less than one half of the entire aggregate, the Document's Cover Texts may be placed on covers that bracket the Document within the aggregate, or the electronic equivalent of covers if the Document is in electronic form.

Otherwise they must appear on printed covers that bracket the whole aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder

fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See [@uref{http://www.gnu.org/copyleft/}](http://www.gnu.org/copyleft/).

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC") contained in the

site means any set of copyrightable works thus published on the MMC site.

``CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0

license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

``Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is ``eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License in a document you have written, include a copy of the License in the document and put the following copyright and license notices just after the title page:

@smallexample

@group

Copyright (C) @var{year} @var{your name}.

Permission is granted to copy, distribute and/or modify this document under the terms of the GNU Free Documentation License, Version 1.3 or any later version published by the Free Software Foundation; with no Invariant Sections, no Front-Cover Texts, and no Back-Cover Texts. A copy of the license is included in the section entitled ``GNU Free Documentation License".

@end group

@end smallexample

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts, replace the ``with@dots{ }Texts."@: line with this:


```
@smallexample
@group
  with the Invariant Sections being @var{list their titles}, with
  the Front-Cover Texts being @var{list}, and with the Back-Cover Texts
  being @var{list}.
@end group
@end smallexample
```

If you have Invariant Sections without Cover Texts, or some other combination of the three, merge those two alternatives to suit the situation.

If your document contains nontrivial examples of program code, we recommend releasing these examples in parallel under your choice of free software license, such as the GNU General Public License, to permit their use in free software.

```
@c Local Variables:
@c ispell-local-pdict: "ispell-dict"
@c End:
```

1.242 libxi 1.7.4

1.242.1 Available under license :

Copyright 1989, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from The Open Group.

Copyright 1989 by Hewlett-Packard Company, Palo Alto, California.

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Hewlett-Packard not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

HEWLETT-PACKARD DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL HEWLETT-PACKARD BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 2008 Peter Hutterer

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHOR BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of the author shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from the author.

Copyright 2009 Red Hat, Inc.

Permission is hereby granted, free of charge, to any person obtaining a

copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice (including the next paragraph) shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

1.243 libxfont 1.5.1

1.243.1 Available under license :

Copyright 2007 Red Hat, Inc

Copyright (c) 2008, 2009, Oracle and/or its affiliates. All rights reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice (including the next paragraph) shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright (c) 1997 by Mark Leisher

Copyright (c) 1998-2003 by Juliusz Chroboczek

Copyright (c) 1998 Go Watanabe, All rights reserved.
Copyright (c) 1998 Kazushi (Jam) Marukawa, All rights reserved.
Copyright (c) 1998 Takuya SHIOZAKI, All rights reserved.
Copyright (c) 1998 X-TrueType Server Project, All rights reserved.
Copyright (c) 2003-2004 After X-TT Project, All rights reserved.

Permission is hereby granted, free of charge, to any person obtaining a copy of this software and associated documentation files (the "Software"), to deal in the Software without restriction, including without limitation the rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the Software, and to permit persons to whom the Software is furnished to do so, subject to the following conditions:

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE AUTHORS OR COPYRIGHT HOLDERS BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Copyright 1990, 1998 The Open Group

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The Open Group shall not be used in advertising or otherwise to promote the sale, use or

other dealings in this Software without prior written authorization from The Open Group.

Copyright 1989 by Digital Equipment Corporation, Maynard, Massachusetts.

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its documentation for any purpose and without fee is hereby granted, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Digital not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

DIGITAL DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL DIGITAL BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1999 SuSE, Inc.

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of SuSE not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. SuSE makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

SuSE DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL SuSE BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1990 Network Computing Devices

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Network Computing Devices not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Network Computing Devices makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

NETWORK COMPUTING DEVICES DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL NETWORK COMPUTING DEVICES BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

Copyright 1990 Network Computing Devices

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the names of Network Computing Devices, or Digital not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission.

NETWORK COMPUTING DEVICES, AND DIGITAL AND DISCLAIM ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL NETWORK COMPUTING DEVICES, OR DIGITAL BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

[Note: clause 3 in the following license, the "advertising clause", was rescinded by Berkeley in 1999. See <<ftp://ftp.cs.berkeley.edu/pub/4bsd/README.Impt.License.Change>>]

Copyright (c) 1991, 1993

The Regents of the University of California. All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. All advertising materials mentioning features or use of this software must display the following acknowledgement:
This product includes software developed by the University of California, Berkeley and its contributors.
4. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright (c) 1998-1999 Shunsuke Akiyama <akiyama@jp.FreeBSD.org>.
All rights reserved.
Copyright (c) 1998-1999
X-TrueType Server Project, All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE AUTHOR AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE

IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Copyright 2004 Keith Packard

Permission to use, copy, modify, distribute, and sell this software and its documentation for any purpose is hereby granted without fee, provided that the above copyright notice appear in all copies and that both that copyright notice and this permission notice appear in supporting documentation, and that the name of Keith Packard not be used in advertising or publicity pertaining to distribution of the software without specific, written prior permission. Keith Packard makes no representations about the suitability of this software for any purpose. It is provided "as is" without express or implied warranty.

KEITH PACKARD DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL KEITH PACKARD BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

```
/* lib/font/fontfile/gunzip.c
   written by Mark Eichin <eichin@kitten.gen.ma.us> September 1996.
   intended for inclusion in X11 public releases. */
```

Copyright (c) 1999 The XFree86 Project Inc.

All Rights Reserved.

The above copyright notice and this permission notice shall be included in all copies or substantial portions of the Software.

THE SOFTWARE IS PROVIDED "AS IS", WITHOUT WARRANTY OF ANY KIND, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO THE WARRANTIES OF MERCHANTABILITY,

FITNESS FOR A PARTICULAR PURPOSE AND NONINFRINGEMENT. IN NO EVENT SHALL THE OPEN GROUP BE LIABLE FOR ANY CLAIM, DAMAGES OR OTHER LIABILITY, WHETHER IN AN ACTION OF CONTRACT, TORT OR OTHERWISE, ARISING FROM, OUT OF OR IN CONNECTION WITH THE SOFTWARE OR THE USE OR OTHER DEALINGS IN THE SOFTWARE.

Except as contained in this notice, the name of The XFree86 Project Inc. shall not be used in advertising or otherwise to promote the sale, use or other dealings in this Software without prior written authorization from The XFree86 Project Inc..

1.244 mesa 10.6.5

1.244.1 Available under license :

Subject: RE: Question about Mesa MLAA license
From: Jorge Jimenez <iryoku@gmail.com>
Date: 01/08/2013 12:50 PM
To: Tom Callaway <tcallawa@redhat.com>
CC: "jorge@iryoku.com" <jorge@iryoku.com>

Yes to both questions.

Thanks,
Jorge

From: Tom Callaway <tcallawa@redhat.com>
Sent: January 8, 2013 6:49 PM
To: Jorge Jimenez <iryoku@gmail.com>
CC: jorge@iryoku.com
Subject: Re: Question about Mesa MLAA license

On 01/08/2013 12:39 PM, Jorge Jimenez wrote:

> Hi Tom,
>
> What we meant with that is that we made an exception for clause 2.
> Instead of clause 2, in the case of the Mesa project, you have to name
> the technique Jimenez's MLAA in the config options of Mesa. We did that
> just to allow them to solve license issues. This exception should be for
> the Mesa project, and any project using Mesa, like Fedora.
>
> We want to widespread usage of our MLAA, so we want to avoid any kind of
> license complications. Hope current one is good for Fedora, if not
> please tell, and we'll see what
> we can do!

Okay, a few more questions:

* If Fedora decides to simply reproduce the quoted statement:
"Uses Jimenez's MLAA. Copyright (C) 2010 by Jorge Jimenez, Belen Masia,
Jose I. Echevarria, Fernando Navarro and Diego Gutierrez."

Specifically, if this is done as part of documentation included with
Mesa, is that sufficient to meet clause 2 even if the Mesa config option
is not set as described in your exception?

* Currently, the Mesa config option for MLAA says: "Morphological
anti-aliasing based on Jimenez\' MLAA. 0 to disable, 8 for default
quality". Is this in compliance with your exception?

Thanks again,

~tom

==

Fedora Project

Subject: RE: Question about Mesa MLAA license
From: Jorge Jimenez <iryoku@gmail.com>
Date: 01/08/2013 12:39 PM
To: "jorge@iryoku.com" <jorge@iryoku.com>, Tom Callaway <tcallawa@redhat.com>

Hi Tom,

What we meant with that is that we made an exception for clause 2.
Instead of clause 2, in the case of the Mesa project, you have to name
the technique
Jimenez's MLAA in the config options of Mesa. We did that
just to allow them to solve license issues. This exception should be for
the Mesa project, and any project using Mesa, like Fedora.

We want to widespread usage of our MLAA, so we want to avoid any kind of
license complications. Hope current one is good for Fedora, if not
please tell, and we'll see what we can do!

Cheers,
Jorge

From: Tom Callaway <tcallawa@redhat.com>
Sent: January 8, 2013 6:30 PM
To: jorge@iryoku.com
Subject: Question about Mesa MLAA license

Jorge,

Thanks for all of your fantastic graphics work! I have been auditing Fedora (a popular distribution of Linux) for license compliance and I came across your MLAA code in Mesa.

The license says:

- * 2. Redistributions in binary form must reproduce the following statement:
- *
* "Uses Jimenez's MLAA. Copyright (C) 2010 by Jorge Jimenez, Belen Masia,
* Jose I. Echevarria, Fernando Navarro and Diego Gutierrez."
*
- * Only for use in the
Mesa project, this point 2 is filled by naming the
* technique Jimenez's MLAA in the Mesa config options.

That wording is unclear. When you say "Only for use in the Mesa project...", it seems like you could either be saying:

- This code may only be used as part of Mesa.

OR

- In Mesa, you can comply with clause 2 by simply selecting "Jimenez's MLAA" in the Mesa config options.

If the first item is true, then we may have to remove the MLAA code from Fedora's copy of Mesa. However, looking at the license on your SMAA code, I do not believe it to be the case. Please let me know either way!

Thanks in advance,

Tom Callaway
Fedora Legal

==

Fedora Project

Some parts of Mesa are copyrighted under the GNU LGPL. See the Mesa/docs/COPYRIGHT file for details.

The following is the standard GNU copyright file.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that

you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the

entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a

work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under

Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library.

(It is understood

that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined

with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited

by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status

of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public

License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 675 Mass Ave, Cambridge, MA 02139, USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.245 nspr 4.11.0

1.245.1 Available under license :

Copyright 2005 Sun Microsystems, Inc. All rights reserved.
Use is subject to license terms.

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

Mozilla Public License Version 2.0

=====

1. Definitions

1.1. "Contributor"

means each individual or legal entity that creates, contributes to the creation of, or owns Covered Software.

1.2. "Contributor Version"

means the combination of the Contributions of others (if any) used by a Contributor and that particular Contributor's Contribution.

1.3. "Contribution"

means Covered Software of a particular Contributor.

1.4. "Covered Software"

means Source Code Form to which the initial Contributor has attached the notice in Exhibit A, the Executable Form of such Source Code Form, and Modifications of such Source Code Form, in each case including portions thereof.

1.5. "Incompatible With Secondary Licenses"

means

(a) that the initial Contributor has attached the notice described in Exhibit B to the Covered Software; or

(b) that the Covered Software was made available under the terms of version 1.1 or earlier of the License, but not also under the terms of a Secondary License.

1.6. "Executable Form"

means any form of the work other than Source Code Form.

1.7. "Larger Work"

means a work that combines Covered Software with other material, in a separate file or files, that is not Covered Software.

1.8. "License"

means this document.

1.9. "Licensable"

means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently, any and all of the rights conveyed by this License.

1.10. "Modifications"

means any of the following:

(a) any file in Source Code Form that results from an addition to, deletion from, or modification of the contents of Covered Software; or

(b) any new file in Source Code Form that contains any Covered Software.

1.11. "Patent Claims" of a Contributor

means any patent claim(s), including without limitation, method, process, and apparatus claims, in any patent Licensable by such Contributor that would be infringed, but for the grant of the License, by the making, using, selling, offering for sale, having made, import, or transfer of either its Contributions or its Contributor Version.

1.12. "Secondary License"

means either the GNU General Public License, Version 2.0, the GNU Lesser General Public License, Version 2.1, the GNU Affero General Public License, Version 3.0, or any later versions of those licenses.

1.13. "Source Code Form"

means the form of the work preferred for making modifications.

1.14. "You" (or "Your")

means an individual or a legal entity exercising rights under this License. For legal entities, "You" includes any entity that controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. License Grants and Conditions

2.1. Grants

Each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license:

- (a) under intellectual property rights (other than patent or trademark) Licensable by such Contributor to use, reproduce, make available, modify, display, perform, distribute, and otherwise exploit its Contributions, either on an unmodified basis, with Modifications, or as part of a Larger Work; and
- (b) under Patent Claims of such Contributor to make, use, sell, offer for sale, have made, import, and otherwise transfer either its Contributions or its Contributor Version.

2.2. Effective Date

The licenses granted in Section 2.1 with respect to any Contribution

become effective for each Contribution on the date the Contributor first distributes such Contribution.

2.3. Limitations on Grant Scope

The licenses granted in this Section 2 are the only rights granted under this License. No additional rights or licenses will be implied from the distribution or licensing of Covered Software under this License. Notwithstanding Section 2.1(b) above, no patent license is granted by a Contributor:

- (a) for any code that a Contributor has removed from Covered Software; or
- (b) for infringements caused by: (i) Your and any other third party's modifications of Covered Software, or (ii) the combination of its Contributions with other software (except as part of its Contributor Version); or
- (c) under Patent Claims infringed by Covered Software in the absence of its Contributions.

This License does not grant any rights in the trademarks, service marks, or logos of any Contributor (except as may be necessary to comply with the notice requirements in Section 3.4).

2.4. Subsequent Licenses

No Contributor makes additional grants as a result of Your choice to distribute the Covered Software under a subsequent version of this License (see Section 10.2) or under the terms of a Secondary License (if permitted under the terms of Section 3.3).

2.5. Representation

Each Contributor represents that the Contributor believes its Contributions are its original creation(s) or it has sufficient rights to grant the rights to its Contributions conveyed by this License.

2.6. Fair Use

This License is not intended to limit any rights You have under applicable copyright doctrines of fair use, fair dealing, or other equivalents.

2.7. Conditions

Sections 3.1, 3.2, 3.3, and 3.4 are conditions of the licenses granted in Section 2.1.

3. Responsibilities

3.1. Distribution of Source Form

All distribution of Covered Software in Source Code Form, including any Modifications that You create or to which You contribute, must be under the terms of this License. You must inform recipients that the Source

Code Form of the Covered Software is governed by the terms of this License, and how they can obtain a copy of this License. You may not attempt to alter or restrict the recipients' rights in the Source Code Form.

3.2. Distribution of Executable Form

If You distribute Covered Software in Executable Form then:

- (a) such Covered Software must also be made available in Source Code Form, as described in Section 3.1, and You must inform recipients of the Executable Form how they can obtain a copy of such Source Code Form by reasonable means in a timely manner, at a charge no more than the cost of distribution to the recipient; and
- (b) You may distribute such Executable Form under the terms of this License, or sublicense it under different terms, provided that the license for the Executable Form does not attempt to limit or alter the recipients' rights in the Source Code Form under this License.

3.3. Distribution of a Larger Work

You may create and distribute a Larger Work under terms of Your choice, provided that You also comply with the requirements of this License for the Covered Software. If the Larger Work is a combination of Covered Software with a work governed by one or more Secondary Licenses, and the Covered Software is not Incompatible With Secondary Licenses, this License permits You to additionally distribute such Covered Software under the terms of such Secondary License(s), so that the recipient of the Larger Work may, at their option, further distribute the Covered Software under the terms of either this License or such Secondary License(s).

3.4. Notices

You may not remove or alter the substance of any license notices (including copyright notices, patent notices, disclaimers of warranty, or limitations of liability) contained within the Source Code Form of the Covered Software, except that You may alter any license notices to the extent required to remedy known factual inaccuracies.

3.5. Application of Additional Terms

You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Software. However, You may do so only on Your own behalf, and not on behalf of any Contributor. You must make it absolutely clear that any such warranty, support, indemnity, or liability obligation is offered by You alone, and You hereby agree to indemnify every Contributor for any liability incurred by such Contributor as a result of warranty, support, indemnity or liability terms You offer. You may include additional disclaimers of warranty and limitations of liability specific to any jurisdiction.

4. Inability to Comply Due to Statute or Regulation

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Software due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be placed in a text file included with all distributions of the Covered Software under this License. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Termination

5.1. The rights granted under this License will terminate automatically if You fail to comply with any of its terms. However, if You become compliant, then the rights granted under this License from a particular Contributor are reinstated (a) provisionally, unless and until such Contributor explicitly and finally terminates Your grants, and (b) on an ongoing basis, if such Contributor fails to notify You of the non-compliance by some reasonable means prior to 60 days after You have come back into compliance. Moreover, Your grants from a particular Contributor are reinstated on an ongoing

basis if such Contributor notifies You of the non-compliance by some reasonable means, this is the first time You have received notice of non-compliance with this License from such Contributor, and You become compliant prior to 30 days after Your receipt of the notice.

5.2. If You initiate litigation against any entity by asserting a patent infringement claim (excluding declaratory judgment actions, counter-claims, and cross-claims) alleging that a Contributor Version directly or indirectly infringes any patent, then the rights granted to You by any and all Contributors for the Covered Software under Section 2.1 of this License shall terminate.

5.3. In the event of termination under Sections 5.1 or 5.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or Your distributors under this License prior to termination shall survive termination.

*

*

* 6. Disclaimer of Warranty

*

* -----

*

*

*

* Covered Software is provided under this License on an "as is" basis, without warranty of any kind, either expressed, implied, or statutory, including, without limitation, warranties that the Covered Software is free of defects, merchantable, fit for a particular purpose or non-infringing. The entire risk as to the quality and performance of the Covered Software is with You. Should any Covered Software prove defective in any respect, You (not any Contributor) assume the cost of any necessary servicing, repair, or correction. This disclaimer of warranty constitutes an essential part of this License. No use of any Covered Software is

* authorized under this License except under this disclaimer.

*

*

*

*

* 7. Limitation of Liability

*

* -----

*

*

*

* Under no circumstances and under no legal theory, whether tort (including negligence), contract, or otherwise, shall any Contributor, or anyone who distributes Covered Software as permitted above, be liable to You for any direct, indirect,

* special, incidental, or consequential damages of any character *
 * including, without limitation,
 damages for lost profits, loss of *
 * goodwill, work stoppage, computer failure or malfunction, or any *
 * and all other commercial damages or losses, even if such party *
 * shall have been informed of the possibility of such damages. This *
 * limitation of liability shall not apply to liability for death or *
 * personal injury resulting from such party's negligence to the *
 * extent applicable law prohibits such limitation. Some *
 * jurisdictions do not allow the exclusion or limitation of *
 * incidental or consequential damages, so this exclusion and *
 * limitation may not apply to You. *

*

8. Litigation

Any litigation relating to this License may be brought only in the courts of a jurisdiction where the defendant maintains its principal place of business and such litigation shall be governed by laws of that jurisdiction, without reference to its conflict-of-law provisions. Nothing in this Section shall prevent a party's ability to bring cross-claims or counter-claims.

9. Miscellaneous

This License represents the complete agreement concerning the subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not be used to construe this License against a Contributor.

10. Versions of the License

10.1. New Versions

Mozilla Foundation is the license steward. Except as provided in Section 10.3, no one other than the license steward has the right to modify or publish new versions of this License. Each version will be given a distinguishing version number.

10.2. Effect of New Versions

You may distribute the Covered Software under the terms of the version of the License under which You originally received the Covered Software, or under the terms of any subsequent version published by the license steward.

10.3. Modified Versions

If you create software not governed by this License, and you want to create a new license for such software, you may create and use a modified version of this License if you rename the license and remove any references to the name of the license steward (except to note that such modified license differs from this License).

10.4. Distributing Source Code Form that is Incompatible With Secondary Licenses

If You choose to distribute Source Code Form that is Incompatible With Secondary Licenses under the terms of this version of the License, the notice described in Exhibit B of this License must be attached.

Exhibit A - Source Code Form License Notice

This Source Code Form is subject to the terms of the Mozilla Public License, v. 2.0. If a copy of the MPL was not distributed with this file, You can obtain one at <http://mozilla.org/MPL/2.0/>.

If it is not possible or desirable to put the notice in a particular file, then You may include the notice in a location (such as a LICENSE file in a relevant directory) where a recipient would be likely to look for such a notice.

You may add additional accurate notices of copyright ownership.

Exhibit B - "Incompatible With Secondary Licenses" Notice

This Source Code Form is "Incompatible With Secondary Licenses", as defined by the Mozilla Public License, v. 2.0.

1.246 pam 1.1.8

1.246.1 Available under license :

Unless otherwise *explicitly* stated the following text describes the licensed conditions under which the contents of this Linux-PAM release may be distributed:

Redistribution and use in source and binary forms of Linux-PAM, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain any existing copyright notice, and this entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce all prior and current copyright notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of any author may not be used to endorse or promote products derived from this software without their specific prior written permission.

ALTERNATIVELY, this product may be distributed under the terms of the GNU General Public License, in which case the provisions of the GNU GPL are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential conflict between the GNU GPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Unless otherwise *explicitly* stated the following text describes the licensed conditions under which the contents of this libpamc release may be distributed:

Redistribution and use in source and binary forms of libpamc,

with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain any existing copyright notice, and this entire permission notice in its entirety, including the disclaimer of warranties.
2. Redistributions in binary form must reproduce all prior and current copyright notices, this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. The name of any author may not be used to endorse or promote products derived from this software without their specific prior written permission.

ALTERNATIVELY, this product may be distributed under the terms of the GNU Library General Public License (LGPL), in which case the provisions of the GNU LGPL are required INSTEAD OF the above restrictions. (This clause is necessary due to a potential conflict between the GNU LGPL and the restrictions contained in a BSD-style copyright.)

THIS SOFTWARE IS PROVIDED ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE AUTHOR(S) BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The licensing conditions for each module in this package are detailed in the module source files.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and

modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further

restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will

be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW.

EXCEPT WHEN

OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN

IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) 19yy <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License,
or
(at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) 19yy name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program
'Gnomovision' (which makes passes at compilers) written by James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into
proprietary programs. If your program is a subroutine library, you may
consider it more useful to permit linking proprietary applications with the
library. If this is what you want to do, use the GNU Library General
Public License instead of this License.

1.247 polkit 0.112

1.247.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
Licenses are intended to guarantee your freedom to share and change
free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some
specially designated Free Software Foundation software, and to any
other libraries whose authors decide to use it. You can use it for
your libraries,
too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
this service if you wish), that you receive source code or can get it
if you want it, that you can change the software or use pieces of it
in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid

anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library",
below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered

only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a

work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)
- b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to

this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License

and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through

that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest

possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

Apache License
Version 2.0, January 2004
<http://www.apache.org/licenses/>

TERMS AND CONDITIONS FOR USE, REPRODUCTION, AND DISTRIBUTION

1. Definitions.

"License" shall mean the terms and conditions for use, reproduction, and distribution as defined by Sections 1 through 9 of this document.

"Licensor" shall mean the copyright owner or entity authorized by the copyright owner that is granting the License.

"Legal Entity" shall mean the union of the acting entity and all other entities that control, are controlled by, or are under common control with that entity. For the purposes of this definition, "control" means (i) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (ii) ownership of fifty percent (50%) or more of the outstanding shares, or (iii) beneficial ownership of such entity.

"You" (or "Your") shall mean an individual or Legal Entity exercising permissions granted by this License.

"Source" form shall mean the preferred form for making modifications, including but not limited to software source code, documentation source, and configuration files.

"Object" form shall mean any form resulting from mechanical transformation or translation of a Source form, including but not limited to compiled object code, generated documentation, and conversions to other media types.

"Work" shall mean the work of authorship, whether in Source or Object form, made available under the License, as indicated by a copyright notice that is included in or attached to the work (an example is provided in the Appendix below).

"Derivative Works" shall mean any work, whether in Source or Object form, that is based on (or derived from) the Work and for which the editorial revisions, annotations, elaborations, or other modifications represent, as a whole, an original work of authorship. For the purposes of this License, Derivative Works shall not include works that remain separable from, or merely link (or bind by name) to the interfaces of, the Work and Derivative Works thereof.

"Contribution" shall mean any work of authorship, including the original version of the Work and any modifications or additions to that Work or Derivative Works thereof, that is intentionally

submitted to Licensor for inclusion in the Work by the copyright owner or by an individual or Legal Entity authorized to submit on behalf of the copyright owner. For the purposes of this definition, "submitted" means any form of electronic, verbal, or written communication sent to the Licensor or its representatives, including but not limited to communication on electronic mailing lists, source code control systems, and issue tracking systems that are managed by, or on behalf of, the Licensor for the purpose of discussing and improving the Work, but excluding communication that is conspicuously marked or otherwise designated in writing by the copyright owner as "Not a Contribution."

"Contributor" shall mean Licensor and any individual or Legal Entity on behalf of whom a Contribution has been received by Licensor and subsequently incorporated within the Work.

2. Grant of Copyright License. Subject to the terms and conditions of this License, each Contributor hereby grants to You a perpetual, worldwide, non-exclusive, no-charge, royalty-free, irrevocable copyright license to reproduce, prepare Derivative Works of, publicly display, publicly perform, sublicense, and distribute the Work and such Derivative Works in Source or Object form.

3. Grant of Patent License. Subject to the terms and conditions of this License, each Contributor hereby grants to You a perpetual, worldwide, non-exclusive, no-charge, royalty-free, irrevocable (except as stated in this section) patent license to make, have made, use, offer to sell, sell, import, and otherwise transfer the Work, where such license applies only to those patent claims licensable by such Contributor that are necessarily infringed by their Contribution(s) alone or by combination of their Contribution(s) with the Work to which such Contribution(s) was submitted. If You institute patent litigation against any entity (including a cross-claim or counterclaim in a lawsuit) alleging that the Work or a Contribution incorporated within the Work constitutes direct or contributory patent infringement, then any patent licenses granted to You under this License for that Work shall terminate as of the date such litigation is filed.

4. Redistribution. You may reproduce and distribute copies of the Work or Derivative Works thereof in any medium, with or without modifications, and in Source or Object form, provided that You meet the following conditions:

(a) You must give any other recipients of the Work or Derivative Works a copy of this License; and

- (b) You must cause any modified files to carry prominent notices stating that You changed the files; and
- (c) You must retain, in the Source form of any Derivative Works that You distribute, all copyright, patent, trademark, and attribution notices from the Source form of the Work, excluding those notices that do not pertain to any part of the Derivative Works; and
- (d) If the Work includes a "NOTICE" text file as part of its distribution, then any Derivative Works that You distribute must include a readable copy of the attribution notices contained within such NOTICE file, excluding those notices that do not pertain to any part of the Derivative Works, in at least one of the following places: within a NOTICE text file distributed as part of the Derivative Works; within the Source form or documentation, if provided along with the Derivative Works; or, within a display generated by the Derivative Works, if and wherever such third-party notices normally appear. The contents of the NOTICE file are for informational purposes only and do not modify the License. You may add Your own attribution notices within Derivative Works that You distribute, alongside or as an addendum to the NOTICE text from the Work, provided that such additional attribution notices cannot be construed as modifying the License.

You may add Your own copyright statement to Your modifications and may provide additional or different license terms and conditions

for use, reproduction, or distribution of Your modifications, or for any such Derivative Works as a whole, provided Your use, reproduction, and distribution of the Work otherwise complies with the conditions stated in this License.

5. Submission of Contributions. Unless You explicitly state otherwise, any Contribution intentionally submitted for inclusion in the Work by You to the Licensor shall be under the terms and conditions of this License, without any additional terms or conditions.

Notwithstanding the above, nothing herein shall supersede or modify the terms of any separate license agreement you may have executed with Licensor regarding such Contributions.

6. Trademarks. This License does not grant permission to use the trade names, trademarks, service marks, or product names of the Licensor, except as required for reasonable and customary use in describing the origin of the Work and reproducing the

content of the NOTICE file.

7. Disclaimer of Warranty. Unless required by applicable law or agreed to in writing, Licensor provides the Work (and each Contributor provides its Contributions) on an "AS IS" BASIS, WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied, including, without limitation, any warranties or conditions of TITLE, NON-INFRINGEMENT, MERCHANTABILITY, or FITNESS FOR A PARTICULAR PURPOSE. You are solely responsible for determining the appropriateness of using or redistributing the Work and assume any risks associated with Your exercise of permissions under this License.

8. Limitation of Liability. In no event and under no legal theory, whether in tort (including negligence), contract, or otherwise, unless required by applicable law (such as deliberate and grossly negligent acts) or agreed to in writing, shall any Contributor be liable to You for damages, including any direct, indirect, special, incidental, or consequential damages of any character arising as a result of this License or out of the use or inability to use the Work (including but not limited to damages for loss of goodwill, work stoppage, computer failure or malfunction, or any and all other commercial damages or losses), even if such Contributor has been advised of the possibility of such damages.

9. Accepting Warranty or Additional Liability. While redistributing the Work or Derivative Works thereof, You may choose to offer, and charge a fee for, acceptance of support, warranty, indemnity, or other liability obligations and/or rights consistent with this License. However, in accepting such obligations, You may act only on Your own behalf and on Your sole responsibility, not on behalf of any other Contributor, and only if You agree to indemnify, defend, and hold each Contributor harmless for any liability incurred by, or claims asserted against, such Contributor by reason of your accepting any such warranty or additional liability.

END OF TERMS AND CONDITIONS

APPENDIX: How to apply the Apache License to your work.

To apply the Apache License to your work, attach the following boilerplate notice, with the fields enclosed by brackets "[]" replaced with your own identifying information. (Don't include the brackets!) The text should be enclosed in the appropriate comment syntax for the file format. We also recommend that a file or class name and description of purpose be included on the same "printed page" as the copyright notice for easier identification within third-party archives.

Copyright [yyyy] [name of copyright owner]

Licensed under the Apache License, Version 2.0 (the "License");
you may not use this file except in compliance with the License.
You may obtain a copy of the License at

<http://www.apache.org/licenses/LICENSE-2.0>

Unless required by applicable law or agreed to in writing, software
distributed under the License is distributed on an "AS IS" BASIS,
WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied.
See the License for the specific language governing permissions and
limitations under the License.

1.248 selinux 2.0.22-1.el6

1.248.1 Available under license :

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to
using it. (Some other Free Software Foundation software is covered by
the GNU Library General Public License instead.) You can apply it to
your programs, too.

When we speak of free software, we are referring to freedom, not
price. Our General Public Licenses
are designed to make sure that you
have the freedom to distribute copies of free software (and charge for
this service if you wish), that you receive source code or can get it
if you want it, that you can change the software or use pieces of it
in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid

anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program

is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can

be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based

on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under

any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

```
This program is free software; you can redistribute it and/or modify  
it under the terms of the GNU General Public License as published by  
the Free Software Foundation; either version  
2 of the License, or  
(at your option) any later version.
```

This program is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.
This is free software, and you are welcome to redistribute it
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program
`Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

1.249 shadow 4.1.5.1

1.249.1 Available under license :

NOTE:

This license has been obsoleted by the change to the BSD-style copyright.

You may continue to use this license if you wish, but you are under no

obligation to do so.

(*

This document is freely plagiarised from the 'Artistic Licence', distributed as part of the Perl v4.0 kit by Larry Wall, which is available from most major archive sites. I stole it from CrackLib.

\$Id\$

*)

This documents purpose is to state the conditions under which this Package (See definition below) viz: "Shadow", the Shadow Password Suite which is held by Julianne Frances Haugh, may be copied, such that the copyright holder maintains some semblance of artistic control over the development of the package, while giving the users of the package the right to use and distribute the Package in a more-or-less customary fashion, plus the right to make reasonable modifications.

So there.

Definitions:

A "Package" refers to the collection of files distributed by the Copyright Holder, and derivatives of that collection of files created through textual modification, or segments thereof.

"Standard Version" refers to such a Package if it has not been modified, or has been modified in accordance with the wishes of the Copyright Holder.

"Copyright Holder" is whoever is named in the copyright or copyrights for the package.

"You" is you, if you're thinking about copying or distributing this Package.

"Reasonable copying fee" is whatever you can justify on the basis of media cost, duplication charges, time of people involved, and so on. (You will not be required to justify it to the Copyright Holder, but only to the computing community at large as a market that must bear the fee.)

"Freely Available" means that no fee is charged for the item itself, though there may be fees involved in handling the item. It also means

that recipients of the item may redistribute it under the same conditions they received it.

1. You

may make and give away verbatim copies of the source form of the Standard Version of this Package without restriction, provided that you duplicate all of the original copyright notices and associated disclaimers.

2. You may apply bug fixes, portability fixes and other modifications derived from the Public Domain or from the Copyright Holder. A Package modified in such a way shall still be considered the Standard Version.

3. You may otherwise modify your copy of this Package in any way, provided that you insert a prominent notice in each changed file stating how and when AND WHY you changed that file, and provided that you do at least ONE of the following:

a) place your modifications in the Public Domain or otherwise make them Freely Available, such as by posting said modifications to Usenet or an equivalent medium, or placing the modifications on a major archive site such as uUNET.uu.net, or by allowing the Copyright Holder to include your modifications in the Standard Version of the Package.

b) use the modified Package only within your corporation or organization.

c) rename any non-standard executables so the names do not conflict with standard executables, which must also be provided, and provide separate documentation for each non-standard executable that clearly documents how it differs from the Standard Version.

d) make other distribution arrangements with the Copyright Holder.

4. You may distribute the programs of this Package in object code or executable form, provided that you do at least ONE of the following:

a) distribute a Standard Version of the executables and library files, together with instructions (in the manual page or equivalent) on where to get the Standard Version.

b) accompany the distribution with the machine-readable source of the Package with your modifications.

c) accompany any non-standard executables with their corresponding Standard Version executables, giving the non-standard executables non-standard names, and clearly

documenting the differences in manual pages (or equivalent), together with instructions on where to get the Standard Version.

d) make other distribution arrangements with the Copyright Holder.

5. You may charge a reasonable copying fee for any distribution of this Package. You may charge any fee you choose for support of this Package. YOU MAY NOT CHARGE A FEE FOR THIS PACKAGE ITSELF. However, you may distribute this Package in aggregate with other (possibly commercial) programs as part of a larger (possibly commercial) software distribution provided that YOU DO NOT ADVERTISE this package as a product of your own.

6. The name of the Copyright Holder may not be used to endorse or promote products derived from this software without specific prior written permission.

7. THIS PACKAGE IS PROVIDED "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

The End

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

675 Mass Ave, Cambridge, MA 02139, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it

if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably

considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary

form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6.

Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then

the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free

Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

1.250 tevent 0.9.25

1.250.1 Available under license :

GNU GENERAL PUBLIC LICENSE

Version 3, 29 June 2007

Copyright (C) 2007 Free Software Foundation, Inc. <<https://fsf.org/>>
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The GNU General Public License is a free, copyleft license for software and other kinds of works.

The licenses for most software and other practical works are designed

to take away your freedom to share and change the works. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change all versions of a program--to make sure it remains free software for all its users. We, the Free Software Foundation, use the GNU General Public License for most of our software; it applies also to any other work released this way by its authors. You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for them if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs, and that you know you can do these things.

To protect your rights, we need to prevent others from denying you these rights or asking you to surrender the rights. Therefore, you have certain responsibilities if you distribute copies of the software, or if you modify it: responsibilities to respect the freedom of others.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must pass on to the recipients the same freedoms that you received. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

Developers that use the GNU GPL protect your rights with two steps:

(1) assert copyright on the software, and (2) offer you this License giving you legal permission to copy, distribute and/or modify it.

For the developers' and authors' protection, the GPL clearly explains that there is no warranty for this free software. For both users' and authors' sake, the GPL requires that modified versions be marked as changed, so that their problems will not be attributed erroneously to authors of previous versions.

Some devices are designed to deny users access to install or run modified versions of the software inside them, although the manufacturer can do so. This is fundamentally incompatible with the aim of protecting users' freedom to change the software. The systematic pattern of such abuse occurs in the area of products for individuals to use, which is precisely where it is most unacceptable. Therefore, we have designed this version of the GPL to prohibit the practice for those products. If such problems arise substantially in other domains, we stand

ready to extend this provision to those domains in future versions of the GPL, as needed to protect the freedom of users.

Finally, every program is threatened constantly by software patents. States should not allow patents to restrict development and use of software on general-purpose computers, but in those that do, we wish to avoid the special danger that patents applied to a free program could make it effectively proprietary. To prevent this, the GPL assures that patents cannot be used to render the program non-free.

The precise terms and conditions for copying, distribution and modification follow.

TERMS AND CONDITIONS

0. Definitions.

"This License" refers to version 3 of the GNU General Public License.

"Copyright" also means copyright-like laws that apply to other kinds of works, such as semiconductor masks.

"The Program" refers to any copyrightable work licensed under this License. Each licensee is addressed as "you". "Licensees" and "recipients" may be individuals or organizations.

To "modify" a work means to copy from or adapt all or part of the work in a fashion requiring copyright permission, other than the making of an exact copy. The resulting work is called a "modified version" of the earlier work or a work "based on" the earlier work.

A "covered work" means either the unmodified Program or a work based on the Program.

To "propagate" a work means to do anything with it that, without permission, would make you directly or secondarily liable for infringement under applicable copyright law, except executing it on a computer or modifying a private copy. Propagation includes copying, distribution (with or without modification), making available to the public, and in some countries other activities as well.

To "convey" a work means any kind of propagation that enables other parties to make or receive copies. Mere interaction with a user through a computer network, with no transfer of a copy, is not conveying.

An interactive user interface displays "Appropriate Legal Notices"

to the extent that it includes a convenient and prominently visible feature that (1) displays an appropriate copyright notice, and (2) tells the user that there is no warranty for the work (except to the extent that warranties are provided), that licensees may convey the work under this License, and how to view a copy of this License. If the interface presents a list of user commands or options, such as a menu, a prominent item in the list meets this criterion.

1. Source Code.

The "source code" for a work means the preferred form of the work for making modifications to it. "Object code" means any non-source form of a work.

A "Standard Interface" means an interface that either is an official standard defined by a recognized standards body, or, in the case of interfaces specified for a particular programming language, one that is widely used among developers working in that language.

The

"System Libraries" of an executable work include anything, other than the work as a whole, that (a) is included in the normal form of packaging a Major Component, but which is not part of that Major Component, and (b) serves only to enable use of the work with that Major Component, or to implement a Standard Interface for which an implementation is available to the public in source code form. A "Major Component", in this context, means a major essential component (kernel, window system, and so on) of the specific operating system (if any) on which the executable work runs, or a compiler used to produce the work, or an object code interpreter used to run it.

The "Corresponding Source" for a work in object code form means all the source code needed to generate, install, and (for an executable work) run the object code and to modify the work, including scripts to control those activities. However, it does not include the work's System Libraries, or general-purpose tools or generally available free programs which are used unmodified in performing those activities but which are not part of the work. For example, Corresponding Source includes interface definition files associated with source files for the work, and the source code for shared libraries and dynamically linked subprograms that the work is specifically designed to require, such as by intimate data communication or control flow between those subprograms and other parts of the work.

The Corresponding Source need not include anything that users can regenerate automatically from other parts of the Corresponding Source.

The Corresponding Source for a work in source code form is that same work.

2. Basic Permissions.

All rights granted under this License are granted for the term of copyright on the Program, and are irrevocable provided the stated conditions are met. This License explicitly affirms your unlimited permission to run the unmodified Program. The output from running a covered work is covered

by this License only if the output, given its content, constitutes a covered work. This License acknowledges your rights of fair use or other equivalent, as provided by copyright law.

You may make, run and propagate covered works that you do not convey, without conditions so long as your license otherwise remains in force. You may convey covered works to others for the sole purpose of having them make modifications exclusively for you, or provide you with facilities for running those works, provided that you comply with the terms of this License in conveying all material for which you do not control copyright. Those thus making or running the covered works for you must do so exclusively on your behalf, under your direction and control, on terms that prohibit them from making any copies of your copyrighted material outside their relationship with you.

Conveying under any other circumstances is permitted solely under the conditions stated below. Sublicensing is not allowed; section 10 makes it unnecessary.

3. Protecting Users' Legal Rights From Anti-Circumvention Law.

No covered work shall be deemed part of an effective technological measure under any applicable law fulfilling obligations under article 11 of the WIPO copyright treaty adopted on 20 December 1996, or similar laws prohibiting or restricting circumvention of such measures.

When you convey a covered work, you waive any legal power to forbid circumvention of technological measures to the extent such circumvention is effected by exercising rights under this License with respect to the covered work, and you disclaim any intention to limit operation or modification of the work as a means of enforcing, against the work's users, your or third parties' legal rights to forbid circumvention of technological measures.

4. Conveying Verbatim Copies.

You may convey verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately
publish on each copy an appropriate copyright notice;
keep intact all notices stating that this License and any non-permissive terms added in accord with section 7 apply to the code;
keep intact all notices of the absence of any warranty; and give all recipients a copy of this License along with the Program.

You may charge any price or no price for each copy that you convey, and you may offer support or warranty protection for a fee.

5. Conveying Modified Source Versions.

You may convey a work based on the Program, or the modifications to produce it from the Program, in the form of source code under the terms of section 4, provided that you also meet all of these conditions:

- a) The work must carry prominent notices stating that you modified it, and giving a relevant date.
- b) The work must carry prominent notices stating that it is released under this License and any conditions added under section 7. This requirement modifies the requirement in section 4 to "keep intact all notices".
- c) You must license the entire work, as a whole, under this License to anyone who comes into possession of a copy. This License will therefore apply, along with any applicable section 7 additional terms, to the whole of the work, and all its parts, regardless of how they are packaged. This License gives no permission to license the work in any other way, but it does not invalidate such permission if you have separately received it.
- d) If the work has interactive user interfaces, each must display Appropriate Legal Notices; however, if the Program has interactive interfaces that do not display Appropriate Legal Notices, your work need not make them do so.

A compilation of a covered work with other separate and independent works, which are not by their nature extensions of the covered work, and which are not combined with it such as to form a larger program, in or on a volume of a storage or distribution medium, is called an "aggregate" if the compilation and its resulting copyright are not used to limit the access or legal rights of the compilation's users

beyond what the individual works permit. Inclusion of a covered work in an aggregate does not cause this License to apply to the other parts of the aggregate.

6. Conveying Non-Source Forms.

You may convey a covered work in object code form under the terms of sections 4 and 5, provided that you also convey the machine-readable Corresponding Source under the terms of this License, in one of these ways:

a) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by the Corresponding Source fixed on a durable physical medium customarily used for software interchange.

b) Convey the object code in, or embodied in, a physical product (including a physical distribution medium), accompanied by a written offer, valid for at least three years and valid for as long as you offer spare parts or customer support for that product model, to give anyone who possesses the object code either (1) a copy of the Corresponding Source for all the software in the product that is covered by this License, on a durable physical medium customarily used for software interchange, for a price no more than your reasonable cost of physically performing this conveying of source, or (2) access to copy the Corresponding Source from a network server at no charge.

c) Convey individual copies of the object code with a copy of the written offer to provide the Corresponding Source. This alternative is allowed only occasionally and noncommercially, and only if you received the object code with such an offer, in accord with subsection 6b.

d) Convey the object code by offering access from a designated place (gratis or for a charge), and offer equivalent access to the Corresponding Source in the same way through the same place at no further charge. You need not require recipients to copy the Corresponding Source along with the object code. If the place to copy the object code is a network server, the Corresponding Source may be on a different server (operated by you or a third party) that supports equivalent copying facilities, provided you maintain clear directions next to the object code saying where to find the Corresponding Source. Regardless of what server hosts the Corresponding Source, you remain obligated to ensure that it is available for as long as needed to satisfy these requirements.

e) Convey the object code using peer-to-peer transmission, provided you inform other peers where the object code and Corresponding Source of the work are being offered to the general public at no charge under subsection 6d.

A separable portion of the object code, whose source code is excluded from the Corresponding Source as a System Library, need not be included in conveying the object code work.

A "User Product" is either (1) a "consumer product", which means any tangible personal property which is normally used for personal, family, or household purposes, or (2) anything designed or sold for incorporation into a dwelling. In determining whether a product is a consumer product, doubtful cases shall be resolved in favor of coverage. For a particular product received by a particular user, "normally used" refers to a typical or common use of that class of product, regardless of the status of the particular user or of the way in which the particular user actually uses, or expects or is expected to use, the product. A product is a consumer product regardless of whether the product has substantial commercial, industrial or non-consumer uses, unless such uses represent the only significant mode of use of the product.

"Installation Information" for a User Product means any methods, procedures, authorization keys, or other information required to install and execute modified versions of a covered work in that User Product from a modified version of its Corresponding Source. The information must suffice to ensure that the continued functioning of the modified object code is in no case prevented or interfered with solely because modification has been made.

If you convey an object code work under this section in, or with, or specifically for use in, a User Product, and the conveying occurs as part of a transaction in which the right of possession and use of the User Product is transferred to the recipient in perpetuity or for a fixed term (regardless of how the transaction is characterized), the Corresponding Source conveyed under this section must be accompanied by the Installation Information. But this requirement does not apply if neither you nor any third party retains the ability to install modified object code on the User Product (for example, the work has been installed in ROM).

The requirement to provide Installation Information does not include a requirement to continue to provide support service, warranty, or updates for a work that has been modified or installed by the recipient, or for

the User Product in which it has been modified or installed. Access to a network may be denied when the modification itself materially and adversely affects the operation of the network or violates the rules and protocols for communication across the network.

Corresponding Source conveyed, and Installation Information provided, in accord with this section must be in a format that is publicly documented (and with an implementation available to the public in source code form), and must require no special password or key for unpacking, reading or copying.

7. Additional Terms.

"Additional permissions" are terms that supplement the terms of this License by making exceptions from one or more of its conditions. Additional permissions that are applicable to the entire Program shall be treated as though they were included in this License, to the extent that they are valid under applicable law. If additional permissions apply only to part of the Program, that part may be used separately under those permissions, but the entire Program remains governed by this License without regard to the additional permissions.

When you convey a copy of a covered work, you may at your option remove any additional permissions from that copy, or from any part of it. (Additional permissions may be written to require their own removal in certain cases when you modify the work.) You may place additional permissions on material, added by you to a covered work, for which you have or can give appropriate copyright permission.

Notwithstanding any other provision of this License, for material you add to a covered work, you may (if authorized by the copyright holders of that material) supplement the terms of this License with terms:

- a) Disclaiming warranty or limiting liability differently from the terms of sections 15 and 16 of this License; or
- b) Requiring preservation of specified reasonable legal notices or author attributions in that material or in the Appropriate Legal Notices displayed by works containing it; or
- c) Prohibiting misrepresentation of the origin of that material, or requiring that modified versions of such material be marked in reasonable ways as different from the original version; or
- d) Limiting the use for publicity purposes of names of licensors or authors of the material; or

e) Declining to grant rights under trademark law for use of some trade names, trademarks, or service marks; or

f) Requiring indemnification of licensors and authors of that material by anyone who conveys the material (or modified versions of it) with contractual assumptions of liability to the recipient, for any liability that these contractual assumptions directly impose on

those licensors and authors.

All other non-permissive additional terms are considered "further restrictions" within the meaning of section 10. If the Program as you received it, or any part of it, contains a notice stating that it is governed by this License along with a term that is a further restriction, you may remove that term. If a license document contains a further restriction but permits relicensing or conveying under this License, you may add to a covered work material governed by the terms of that license document, provided that the further restriction does not survive such relicensing or conveying.

If you add terms to a covered work in accord with this section, you must place, in the relevant source files, a statement of the additional terms that apply to those files, or a notice indicating where to find the applicable terms.

Additional terms, permissive or non-permissive, may be stated in the form of a separately written license, or stated as exceptions; the above requirements apply either way.

8. Termination.

You may not propagate or modify a covered work except as expressly provided under this License. Any attempt otherwise to propagate or modify it is void, and will automatically terminate your rights under this License (including any patent licenses granted under the third paragraph of section 11).

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the

violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, you do not qualify to receive new licenses for the same material under section 10.

9. Acceptance Not Required for Having Copies.

You are not required to accept this License in order to receive or run a copy of the Program. Ancillary propagation of a covered work occurring solely as a consequence of using peer-to-peer transmission to receive a copy likewise does not require acceptance. However, nothing other than this License grants you permission to propagate or modify any covered work. These actions infringe copyright if you do not accept this License. Therefore, by modifying or propagating a covered work, you indicate your acceptance of this License to do so.

10. Automatic Licensing of Downstream Recipients.

Each time you convey a covered work, the recipient automatically receives a license from the original licensors, to run, modify and propagate that work, subject to this License. You are not responsible for enforcing compliance by third parties with this License.

An "entity transaction" is a transaction transferring control of an organization, or substantially all assets of one, or subdividing an organization, or merging organizations. If propagation of a covered work results from an entity transaction, each party to that transaction who receives a copy of the work also receives whatever licenses to the work the party's predecessor in interest had or could give under the previous paragraph, plus a right to possession of the Corresponding Source of the work from the predecessor in interest, if the predecessor has it or can get it with reasonable efforts.

You may not impose any further restrictions on the exercise of the rights granted or affirmed under this License. For example, you may not impose a license fee, royalty, or other charge for exercise of rights granted under this License, and you may not initiate litigation (including a cross-claim or counterclaim in a lawsuit) alleging that any patent claim is infringed by making, using, selling, offering for

sale, or importing the Program or any portion of it.

11. Patents.

A "contributor" is a copyright holder who authorizes use under this License of the Program or a work on which the Program is based. The work thus licensed is called the contributor's "contributor version".

A contributor's "essential patent claims" are all patent claims owned or controlled by the contributor, whether already acquired or hereafter acquired, that would be infringed by some manner, permitted by this License, of making, using, or selling its contributor version, but do not include claims that would be infringed only as a consequence of further modification of the contributor version. For purposes of this definition, "control" includes the right to grant patent sublicenses in a manner consistent with the requirements of this License.

Each contributor grants you a non-exclusive, worldwide, royalty-free patent license under the contributor's essential patent claims, to make, use, sell, offer for sale, import and otherwise run, modify and propagate the contents of its contributor version.

In the following three paragraphs, a "patent license" is any express agreement or commitment, however denominated, not to enforce a patent (such as an express permission to practice a patent or covenant not to sue for patent infringement). To "grant" such a patent license to a party means to make such an agreement or commitment not to enforce a patent against the party.

If you convey a covered work, knowingly relying on a patent license, and the Corresponding Source of the work is not available for anyone to copy, free of charge and under the terms of this License, through a publicly available network server or other readily accessible means, then you must either (1) cause the Corresponding Source to be so available, or (2) arrange to deprive yourself of the benefit of the patent license for this particular work, or (3) arrange, in a manner consistent with the requirements of this License, to extend the patent license to downstream recipients. "Knowingly relying" means you have actual knowledge that, but for the patent license, your conveying the covered work in a country, or your recipient's use of the covered work in a country, would infringe one or more identifiable patents in that country that you have reason to believe are valid.

If, pursuant to or in connection with a single transaction or arrangement, you convey, or propagate by procuring conveyance of, a

covered work, and grant a patent license to some of the parties receiving the covered work authorizing them to use, propagate, modify or convey a specific copy of the covered work, then the patent license you grant is automatically extended to all recipients of the covered work and works based on it.

A patent license is "discriminatory" if it does not include within the scope of its coverage, prohibits the exercise of, or is conditioned on the non-exercise of one or more of the rights that are specifically granted under this License. You may not convey a covered work if you are a party to an arrangement with a third party that is in the business of distributing software, under which you make payment to the third party based on the extent of your activity of conveying the work, and under which the third party grants, to any of the parties who would receive the covered work from you, a discriminatory patent license (a) in connection with copies of the covered work conveyed by you (or copies made from those copies), or (b) primarily for and in connection with specific products or compilations that contain the covered work, unless you entered into that arrangement, or that patent license was granted, prior to 28 March 2007.

Nothing in this License shall be construed as excluding or limiting any implied license or other defenses to infringement that may otherwise be available to you under applicable patent law.

12. No Surrender of Others' Freedom.

If conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot convey a covered work so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not convey it at all. For example, if you agree to terms that obligate you to collect a royalty for further conveying from those to whom you convey the Program, the only way you could satisfy both those terms and this License would be to refrain entirely from conveying the Program.

13. Use with the GNU Affero General Public License.

Notwithstanding any other provision of this License, you have permission to link or combine any covered work with a work licensed under version 3 of the GNU Affero General Public License into a single combined work, and to convey the resulting work. The terms of this License will continue to apply to the part which is the covered work, but the special requirements of the GNU Affero General Public License, section 13, concerning interaction through a network will apply to the

combination as such.

14. Revised Versions of this License.

The Free Software Foundation may publish revised and/or new versions of the GNU General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies that a certain numbered version of the GNU General Public License "or any later version" applies to it, you have the option of following the terms and conditions either of that numbered version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of the GNU General Public License, you may choose any version ever published by the Free Software Foundation.

If the Program specifies that a proxy can decide which future versions of the GNU General Public License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Program.

Later license versions may give you additional or different permissions. However, no additional obligations are imposed on any author or copyright holder as a result of your choosing to follow a later version.

15. Disclaimer of Warranty.

THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. Limitation of Liability.

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MODIFIES AND/OR CONVEYS THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF

DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

17.

Interpretation of Sections 15 and 16.

If the disclaimer of warranty and limitation of liability provided above cannot be given local legal effect according to their terms, reviewing courts shall apply local law that most closely approximates an absolute waiver of all civil liability in connection with the Program, unless a warranty or assumption of liability accompanies a copy of the Program in return for a fee.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively state the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software: you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation, either version 3 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program. If not, see <https://www.gnu.org/licenses/>.

Also add information on how to contact you by electronic and paper mail.

If the program does terminal interaction, make it output a short

notice like this when it starts in an interactive mode:

```
<program> Copyright (C) <year> <name of author>  
This program comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, your program's commands might be different; for a GUI interface, you would use an "about box".

You should also get your employer (if you work as a programmer) or school, if any, to sign a "copyright disclaimer" for the program, if necessary. For more information on this, and how to apply and follow the GNU GPL, see <https://www.gnu.org/licenses/>.

The GNU General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Lesser General Public License instead of this License. But first, please read <https://www.gnu.org/licenses/why-not-lgpl.html>.

1.251 libnss-nisplus 2.31

1.251.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some

specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The

former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to

exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that

uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood

that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

- b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.
- c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to

refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our

decision

will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey

the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>

Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.252 libnss-nis 2.17

1.252.1 Available under license :

GNU LIBRARY GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
59 Temple Place - Suite 330, Boston, MA 02111-1307, USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public

Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized

party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The

threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each

version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN

WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

Appendix: How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year>
<name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place - Suite 330, Boston, MA 02111-1307, USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your

school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!
@c The GNU Lesser General Public License.
@center Version 2.1, February 1999

@c This file is intended to be included within another document,
@c hence no sectioning command or @node.

@display
Copyright @copyright{ } 1991, 1999 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]
@end display

@subheading Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software---to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software---typically libraries---of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get

it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative

of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the @dfn{Lesser} General Public License because it does @emph{Less} to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a ``work based on the library" and a ``work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

@subheading TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

@enumerate 0

@item

This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other

authorized party saying it may be distributed under the terms of this Lesser General Public License (also called ``this License"). Each licensee is addressed as ``you".

A ``library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The ``Library", below, refers to any such software library or work which has been distributed under these terms. A ``work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it,

either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term ``modification".)

``Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

@item

You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

@item

You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and

distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

@enumerate a

@item

The modified work must itself be a software library.

@item

You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

@item

You must

cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

@item

If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

@end enumerate

These requirements apply to the modified work as a whole. If identifiable sections

of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or

collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this

License.

@item

You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

@item

You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

@item

A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a ``work that uses the Library''. Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a ``work that uses the Library'' with the Library

creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a ``work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a ``work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

@item

As an exception to the Sections above, you may also combine or link a ``work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

@enumerate a

@item

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under

Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable ``work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

@item

Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

@item

Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

@item

If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

@item

Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

@end enumerate

For an executable, the required form of the ``work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot

use both them and the Library together in an executable that you distribute.

@item

You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

@enumerate a

@item

Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

@item

Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

@end enumerate

@item

You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

@item

You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited

by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

@item

Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the

original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

@item

If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

@item

If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

@item

The Free Software Foundation
may publish revised and/or new
versions of the Lesser General Public License from time to time.
Such new versions will be similar in spirit to the present version,
but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library
specifies a version number of this License which applies to it and
``any later version'', you have the option of following the terms and
conditions either of that version or of any later version published by
the Free Software Foundation. If the Library does not specify a
license version number, you may choose any version ever published by
the Free Software Foundation.

@item

If you wish to incorporate parts of the Library into other free
programs whose distribution conditions are incompatible with these,
write to the author to ask for permission. For software which is
copyrighted by the Free Software Foundation, write to the Free
Software Foundation; we sometimes make exceptions for
this. Our
decision will be guided by the two goals of preserving the free status
of all derivatives of our free software and of promoting the sharing
and reuse of software generally.

@center @b{NO WARRANTY}

@item

BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO
WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW.
EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR
OTHER PARTIES PROVIDE THE LIBRARY ``AS IS'' WITHOUT WARRANTY OF ANY
KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE
IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR
PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE
LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME
THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

@item

IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN
WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY
AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE,
BE LIABLE TO YOU
FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR
CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE
LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING

RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

@end enumerate

@subheading END OF TERMS AND CONDITIONS

@page

@subheading How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the ``copyright" line and a pointer to where the full notice is found.

@smallexample

@var{one line to give the library's name and an idea of what it does.}

Copyright (C) @var{year} @var{name of author}

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301, USA.

@end

smallexample

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a ``copyright disclaimer" for the library, if

necessary. Here is a sample; alter the names:

@smallexample

Yoyodyne, Inc., hereby disclaims all copyright interest in the library
'Frob' (a library for tweaking knobs) written by James Random Hacker.

@var{signature of Ty Coon}, 1 April 1990

Ty Coon, President of Vice

@end smallexample

That's all there is to it!

Copyright 1992, 1993, 1994, 1997 Henry Spencer. All rights reserved.
This software is not subject to any license of the American Telephone
and Telegraph Company or of the Regents of the University of California.

Permission is granted to anyone to use this software for any purpose on
any computer system, and to alter it and redistribute it, subject
to the following restrictions:

1. The author is not responsible for the consequences of use of this
software, no matter how awful, even if they arise from flaws in it.
2. The origin of this software must not be misrepresented, either by
explicit claim or by omission. Since few users ever read sources,
credits must appear in the documentation.
3. Altered versions must be plainly marked as such, and must not be
misrepresented as being the original software. Since few users
ever read sources, credits must appear in the documentation.
4. This notice may not be removed or altered.

GNU GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your
freedom to share and change it. By contrast, the GNU General Public
License is intended to guarantee your freedom to share and change free
software--to make sure the software is free for all its users. This
General Public License applies to most of the Free Software
Foundation's software and to any other program whose authors commit to
using it. (Some other Free Software Foundation software is covered by

the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program

or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.

b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide

a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

- a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,
- c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program

in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent

infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies

a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest

to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

```
Yoyodyne, Inc., hereby disclaims all copyright interest in the program  
'Gnomovision' (which makes passes at compilers) written by James Hacker.
```

```
<signature of Ty Coon>, 1 April 1989  
Ty Coon, President of Vice
```

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

@c The GNU Free Documentation License.

@center Version 1.3, 3 November 2008

@c This file is intended to be included within another document,

@c hence no sectioning command or @node.

@display

Copyright @copyright{ } 2000, 2001, 2002, 2007, 2008 Free Software Foundation, Inc.

@uref{<http://fsf.org/>}

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

@end display

@enumerate 0

@item

PREAMBLE

The purpose of this License is to make a manual, textbook, or other functional and useful document @dfn{free} in the sense of freedom: to assure everyone the effective freedom to copy and redistribute it, with or without modifying it, either commercially or noncommercially. Secondly, this License preserves for the author and publisher a way to get credit for their work, while not being considered responsible for modifications made by others.

This License is a kind of ``copyleft'', which means that derivative works of the document must themselves be free in the same sense. It complements the GNU General Public License, which is a copyleft license designed for free software.

We have designed this License in order to use it for manuals for free software, because free software needs free documentation: a free program should come with manuals providing the same freedoms that the software does. But this License is not limited to software manuals; it can be used for any textual work, regardless of subject matter or whether it is published as a printed book. We recommend this License principally for works whose purpose is instruction or reference.

@item

APPLICABILITY AND DEFINITIONS

This License applies to any manual or other work, in any medium, that contains a notice placed by the copyright holder saying it can be distributed under the terms of this License. Such a notice grants a world-wide, royalty-free license, unlimited in duration, to use that work under the conditions stated herein. The "Document", below, refers

to any such manual or work. Any member of the public is a licensee, and is addressed as "you". You accept the license if you copy, modify or distribute the work in a way requiring permission under copyright law.

A "Modified Version" of the Document means any work containing the Document or a portion of it, either copied verbatim, or with modifications and/or translated into another language.

A "Secondary Section" is a named appendix or a front-matter section of the Document that deals exclusively with the relationship of the publishers or authors of the Document to the Document's overall subject (or to related matters) and contains nothing that could fall directly within that overall subject. (Thus, if the Document is in part a textbook of mathematics, a Secondary Section may not explain any mathematics.) The relationship could be a matter of historical connection with the subject or with related matters, or of legal, commercial, philosophical, ethical or political position regarding them.

The "Invariant Sections" are certain Secondary Sections whose titles are designated, as being those of Invariant Sections, in the notice that says that the Document is released under this License. If a section does not fit the above definition of Secondary then it is not allowed to be designated as Invariant. The Document may contain zero Invariant Sections. If the Document does not identify any Invariant Sections then there are none.

The "Cover Texts" are certain short passages of text that are listed, as Front-Cover Texts or Back-Cover Texts, in the notice that says that the Document is released under this License. A Front-Cover Text may be at most 5 words, and a Back-Cover Text may be at most 25 words.

A "Transparent" copy of the Document means a machine-readable copy, represented in a format whose specification is available to the general public, that is suitable for revising the document straightforwardly with generic text editors or (for images composed of pixels) generic paint programs or (for drawings) some widely available drawing editor, and that is suitable for input to text formatters or

for automatic translation to a variety of formats suitable for input to text formatters. A copy made in an otherwise Transparent file format whose markup, or absence of markup, has been arranged to thwart or discourage subsequent modification by readers is not Transparent. An image format is not Transparent if used for any substantial amount of text. A copy that is not ``Transparent" is called ``Opaque".

Examples of suitable formats for Transparent copies include plain ASCII without markup, Texinfo input format, La@TeX{ } input format, SGML or XML using a publicly available DTD, and standard-conforming simple HTML, PostScript or PDF designed for human modification. Examples of transparent image formats include PNG, XCF and JPG. Opaque formats include proprietary formats that can be read and edited only by proprietary word processors, SGML or XML for which the DTD and/or processing tools are not generally available, and the machine-generated HTML, PostScript or PDF produced by some word processors for output purposes only.

The ``Title Page" means, for a printed book, the title page itself, plus such following pages as are needed to hold, legibly, the material this License requires to appear in the title page. For works in formats which do not have any title page as such, ``Title Page" means the text near the most prominent appearance of the work's title, preceding the beginning of the body of the text.

The ``publisher" means any person or entity that distributes copies of the Document to the public.

A section ``Entitled XYZ" means a named subunit of the Document whose title either is precisely XYZ or contains XYZ in parentheses following text that translates XYZ in another language. (Here XYZ stands for a specific section name mentioned below, such as ``Acknowledgements", ``Dedications", ``Endorsements", or ``History".) To ``Preserve the Title" of such a section when you modify the Document means that it remains a section ``Entitled XYZ" according to this definition.

The Document may include Warranty Disclaimers next to the notice which states that this License applies to the Document. These Warranty Disclaimers are considered to be included by reference in this License, but only as regards disclaiming warranties: any other implication that these Warranty Disclaimers may have is void and has no effect on the meaning of this License.

@item

VERBATIM COPYING

You may copy and distribute the Document in any medium, either commercially or noncommercially, provided that this License, the copyright notices, and the license notice saying this License applies to the Document are reproduced in all copies, and that you add no other conditions whatsoever to those of this License. You may not use technical measures to obstruct or control the reading or further copying of the copies

you make or distribute. However, you may accept compensation in exchange for copies. If you distribute a large enough number of copies you must also follow the conditions in section 3.

You may also lend copies, under the same conditions stated above, and you may publicly display copies.

@item

COPYING IN QUANTITY

If you publish printed copies (or copies in media that commonly have printed covers) of the Document, numbering more than 100, and the Document's license notice requires Cover Texts, you must enclose the copies in covers that carry, clearly and legibly, all these Cover Texts: Front-Cover Texts on the front cover, and Back-Cover Texts on the back cover. Both covers must also clearly and legibly identify you as the publisher of these copies. The front cover must present the full title with all words of the title equally prominent and visible. You may add other material on the covers in addition.

Copying with changes limited to the covers, as long as they preserve the

title of the Document and satisfy these conditions, can be treated as verbatim copying in other respects.

If the required texts for either cover are too voluminous to fit legibly, you should put the first ones listed (as many as fit reasonably) on the actual cover, and continue the rest onto adjacent pages.

If you publish or distribute Opaque copies of the Document numbering more than 100, you must either include a machine-readable Transparent copy along with each Opaque copy, or state in or with each Opaque copy a computer-network location from which the general network-using public has access to download using public-standard network protocols a complete Transparent copy of the Document, free of added material.

If you use the latter option, you must take reasonably prudent steps, when you begin distribution of Opaque copies in quantity, to ensure that this Transparent copy will remain thus accessible at the stated location until at least one year after the last time you distribute

an

Opaque copy (directly or through your agents or retailers) of that edition to the public.

It is requested, but not required, that you contact the authors of the Document well before redistributing any large number of copies, to give them a chance to provide you with an updated version of the Document.

@item

MODIFICATIONS

You may copy and distribute a Modified Version of the Document under the conditions of sections 2 and 3 above, provided that you release the Modified Version under precisely this License, with the Modified Version filling the role of the Document, thus licensing distribution and modification of the Modified Version to whoever possesses a copy of it. In addition, you must do these things in the Modified Version:

@enumerate A

@item

Use in the Title Page (and on the covers, if any) a title distinct from that of the Document, and from those of previous versions (which should, if there were any, be listed in the History section of the Document). You may use the same title as a previous version if the original publisher of that version gives permission.

@item

List on the Title Page, as authors, one or more persons or entities responsible for authorship of the modifications in the Modified Version, together with at least five of the principal authors of the Document (all of its principal authors, if it has fewer than five), unless they release you from this requirement.

@item

State on the Title page the name of the publisher of the Modified Version, as the publisher.

@item

Preserve all the copyright notices of the Document.

@item

Add an appropriate copyright notice for your modifications adjacent to the other copyright notices.

@item

Include, immediately after the copyright notices, a license notice giving the public permission to use the Modified Version under the

terms of this License, in the form shown in the Addendum below.

@item

Preserve in that license notice the full lists of Invariant Sections and required Cover Texts given in the Document's license notice.

@item

Include an unaltered copy of this License.

@item

Preserve the section Entitled ``History'', Preserve its Title, and add to it an item stating at least the title, year, new authors, and publisher of the Modified Version as given on the Title Page. If there is no section Entitled ``History'' in the Document, create one stating the title, year, authors, and publisher of the Document as given on its Title Page, then add an item describing the Modified Version as stated in the previous sentence.

@item

Preserve the network location, if any, given in the Document for public access to a Transparent copy of the Document, and likewise the network locations given in the Document for previous versions it was based on. These may be placed in the ``History'' section. You may omit a network location for a work that was published at least four years before the Document itself, or if the original publisher of the version it refers to gives permission.

@item

For any section Entitled ``Acknowledgements'' or ``Dedications'', Preserve the Title of the section, and preserve in the section all the substance and tone of each of the contributor acknowledgements and/or dedications given therein.

@item

Preserve all the Invariant Sections of the Document, unaltered in their text and in their titles. Section numbers or the equivalent are not considered part of the section titles.

@item

Delete any section Entitled ``Endorsements''. Such a section may not be included in the Modified Version.

@item

Do not retitle any existing section to be Entitled ``Endorsements'' or to conflict in title with any Invariant Section.

@item

Preserve any Warranty Disclaimers.

@end enumerate

If the Modified Version includes new front-matter sections or appendices that qualify as Secondary Sections and contain no material copied from the Document, you may at your option designate some or all of these sections as invariant. To do this, add their titles to the list of Invariant

Sections in the Modified Version's license notice.

These titles must be distinct from any other section titles.

You may add a section Entitled ``Endorsements'', provided it contains nothing but endorsements of your Modified Version by various parties---for example, statements of peer review or that the text has been approved by an organization as the authoritative definition of a standard.

You may add a passage of up to five words as a Front-Cover Text, and a passage of up to 25 words as a Back-Cover Text, to the end of the list of Cover Texts in the Modified Version. Only one passage of Front-Cover Text and one of Back-Cover Text may be added by (or through arrangements made by) any one entity. If the Document already includes a cover text for the same cover, previously added by you or by arrangement made by the same entity you are acting on behalf of, you may not add another; but you may replace the old one, on explicit permission from the previous publisher that added the old one.

The author(s) and publisher(s) of the Document do not by this License give permission to use their names for publicity for or to assert or imply endorsement of any Modified Version.

@item

COMBINING DOCUMENTS

You may combine the Document with other documents released under this License, under the terms defined in section 4 above for modified versions, provided that you include in the combination all of the Invariant Sections of all of the original documents, unmodified, and list them all as Invariant Sections of your combined work in its license notice, and that you preserve all their Warranty Disclaimers.

The combined work need only contain one copy of this License, and multiple identical Invariant Sections may be replaced with a single copy. If there are multiple Invariant Sections with the same name but different contents, make the title of each such section unique by adding at the end of it, in parentheses, the name of the original

author or publisher of that section if known,
or else a unique number.

Make the same adjustment to the section titles in the list of
Invariant Sections in the license notice of the combined work.

In the combination, you must combine any sections Entitled ``History"
in the various original documents, forming one section Entitled
``History"; likewise combine any sections Entitled ``Acknowledgements",
and any sections Entitled ``Dedications". You must delete all
sections Entitled ``Endorsements."

@item

COLLECTIONS OF DOCUMENTS

You may make a collection consisting of the Document and other documents
released under this License, and replace the individual copies of this
License in the various documents with a single copy that is included in
the collection, provided that you follow the rules of this License for
verbatim copying of each of the documents in all other respects.

You may extract a single document from such a collection, and distribute
it individually under this License, provided you insert a copy of this
License
into the extracted document, and follow this License in all
other respects regarding verbatim copying of that document.

@item

AGGREGATION WITH INDEPENDENT WORKS

A compilation of the Document or its derivatives with other separate
and independent documents or works, in or on a volume of a storage or
distribution medium, is called an ``aggregate" if the copyright
resulting from the compilation is not used to limit the legal rights
of the compilation's users beyond what the individual works permit.
When the Document is included in an aggregate, this License does not
apply to the other works in the aggregate which are not themselves
derivative works of the Document.

If the Cover Text requirement of section 3 is applicable to these
copies of the Document, then if the Document is less than one half of
the entire aggregate, the Document's Cover Texts may be placed on
covers that bracket the Document within the aggregate, or the
electronic equivalent of covers if the Document is in electronic
form.

Otherwise they must appear on printed covers that bracket the whole
aggregate.

@item

TRANSLATION

Translation is considered a kind of modification, so you may distribute translations of the Document under the terms of section 4. Replacing Invariant Sections with translations requires special permission from their copyright holders, but you may include translations of some or all Invariant Sections in addition to the original versions of these Invariant Sections. You may include a translation of this License, and all the license notices in the Document, and any Warranty Disclaimers, provided that you also include the original English version of this License and the original versions of those notices and disclaimers. In case of a disagreement between the translation and the original version of this License or a notice or disclaimer, the original version will prevail.

If a section in the Document is Entitled ``Acknowledgements'', ``Dedications'', or ``History'', the requirement (section 4) to Preserve its Title (section 1) will typically require changing the actual title.

@item

TERMINATION

You may not copy, modify, sublicense, or distribute the Document except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, or distribute it is void, and will automatically terminate your rights under this License.

However, if you cease all violation of this License, then your license from a particular copyright holder is reinstated (a) provisionally, unless and until the copyright holder explicitly and finally terminates your license, and (b) permanently, if the copyright holder fails to notify you of the violation by some reasonable means prior to 60 days after the cessation.

Moreover, your license from a particular copyright holder is reinstated permanently if the copyright holder notifies you of the violation by some reasonable means, this is the first time you have received notice of violation of this License (for any work) from that copyright holder, and you cure the violation prior to 30 days after your receipt of the notice.

Termination of your rights under this section does not terminate the licenses of parties who have received copies or rights from you under this License. If your rights have been terminated and not permanently reinstated, receipt of a copy of some or all of the same material does

not give you any rights to use it.

@item

FUTURE REVISIONS OF THIS LICENSE

The Free Software Foundation may publish new, revised versions of the GNU Free Documentation License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns. See <http://www.gnu.org/copyleft/>.

Each version of the License is given a distinguishing version number. If the Document specifies that a particular numbered version of this License "or any later version" applies to it, you have the option of following the terms and conditions either of that specified version or of any later version that has been published (not as a draft) by the Free Software Foundation. If the Document does not specify a version number of this License, you may choose any version ever published (not as a draft) by the Free Software Foundation. If the Document specifies that a proxy can decide which future versions of this License can be used, that proxy's public statement of acceptance of a version permanently authorizes you to choose that version for the Document.

@item

RELICENSING

"Massive Multiauthor Collaboration Site" (or "MMC Site") means any World Wide Web server that publishes copyrightable works and also provides prominent facilities for anybody to edit those works. A public wiki that anybody can edit is an example of such a server. A "Massive Multiauthor Collaboration" (or "MMC") contained in the site means any set of copyrightable works thus published on the MMC site.

"CC-BY-SA" means the Creative Commons Attribution-Share Alike 3.0 license published by Creative Commons Corporation, a not-for-profit corporation with a principal place of business in San Francisco, California, as well as future copyleft versions of that license published by that same organization.

"Incorporate" means to publish or republish a Document, in whole or in part, as part of another Document.

An MMC is "eligible for relicensing" if it is licensed under this License, and if all works that were first published under this License

somewhere other than this MMC, and subsequently incorporated in whole or in part into the MMC, (1) had no cover texts or invariant sections, and (2) were thus incorporated prior to November 1, 2008.

The operator of an MMC Site may republish an MMC contained in the site under CC-BY-SA on the same site at any time before August 1, 2009, provided the MMC is eligible for relicensing.

@end enumerate

@page

@heading ADDENDUM: How to use this License for your documents

To use this License
in a document you have written, include a copy of
the License in the document and put the following copyright and
license notices just after the title page:

@smallexample

@group

Copyright (C) @var{year} @var{your name}.

Permission is granted to copy, distribute and/or modify this document
under the terms of the GNU Free Documentation License, Version 1.3
or any later version published by the Free Software Foundation;
with no Invariant Sections, no Front-Cover Texts, and no Back-Cover
Texts. A copy of the license is included in the section entitled ``GNU
Free Documentation License".

@end group

@end smallexample

If you have Invariant Sections, Front-Cover Texts and Back-Cover Texts,
replace the ``with@dots{ }Texts."@: line with this:

@smallexample

@group

with the Invariant Sections being @var{list their titles}, with
the Front-Cover Texts being @var{list}, and with the Back-Cover Texts
being @var{list}.

@end group

@end smallexample

If you have Invariant
Sections without Cover Texts, or some other
combination of the three, merge those two alternatives to suit the
situation.

If your document contains nontrivial examples of program code, we
recommend releasing these examples in parallel under your choice of

free software license, such as the GNU General Public License,
to permit their use in free software.

@c Local Variables:

@c ispell-local-pdict: "ispell-dict"

@c End:

This file contains the copying permission notices for various files in the GNU C Library distribution that have copyright owners other than the Free Software Foundation. These notices all require that a copy of the notice be included in the accompanying documentation and be distributed with binary distributions of the code, so be sure to include this file along with any binary distributions derived from the GNU C Library.

All code incorporated from 4.4 BSD is distributed under the following license:

Copyright (C) 1991 Regents of the University of California.
All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. [This condition was removed.]
4. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE REGENTS AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE REGENTS OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The DNS resolver code, taken from BIND 4.9.5, is copyrighted by UC Berkeley, by Digital Equipment Corporation and by Internet Software Consortium. The DEC portions are under the following license:

Portions Copyright (C) 1993 by Digital Equipment Corporation.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies, and that the name of Digital Equipment Corporation not be used in advertising or publicity pertaining to distribution of the document or software without specific, written prior permission.

THE SOFTWARE IS PROVIDED ``AS IS" AND DIGITAL EQUIPMENT CORP. DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL DIGITAL EQUIPMENT CORPORATION BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

The ISC portions are under the following license:

Portions Copyright (c) 1996-1999 by Internet Software Consortium.

Permission to use, copy, modify, and distribute this software for any purpose with or without fee is hereby granted, provided that the above copyright notice and this permission notice appear in all copies.

THE SOFTWARE IS PROVIDED "AS IS" AND INTERNET SOFTWARE CONSORTIUM DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS. IN NO EVENT SHALL INTERNET SOFTWARE CONSORTIUM BE LIABLE FOR ANY SPECIAL, DIRECT, INDIRECT, OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

The Sun RPC support (from rpcsrc-4.0) is covered by the following license:

Copyright (c) 2010, Oracle America, Inc.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are

met:

- * Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
- * Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
- * Neither the name of the "Oracle America, Inc." nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT HOLDER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The following CMU license covers some of the support code for Mach, derived from Mach 3.0:

Mach Operating System
Copyright (C) 1991,1990,1989 Carnegie Mellon University
All Rights Reserved.

Permission to use, copy, modify and distribute this software and its documentation is hereby granted, provided that both the copyright notice and this permission notice appear in all copies of the software, derivative works or modified versions, and any portions thereof, and that both notices appear in supporting documentation.

CARNEGIE MELLON ALLOWS FREE USE OF THIS SOFTWARE IN ITS ``AS IS" CONDITION. CARNEGIE MELLON DISCLAIMS ANY LIABILITY OF ANY KIND FOR ANY DAMAGES WHATSOEVER RESULTING FROM THE USE OF THIS SOFTWARE.

Carnegie Mellon requests users of this software to return to

Software Distribution Coordinator

School of Computer Science
Carnegie Mellon University
Pittsburgh PA 15213-3890

or Software.Distribution@CS.CMU.EDU any improvements or extensions that they make and grant Carnegie Mellon the rights to redistribute these changes.

The file `if_ppp.h` is under the following CMU license:

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

1. Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.
2. Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.
3. Neither the name of the University nor the names of its contributors may be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY CARNEGIE MELLON UNIVERSITY AND CONTRIBUTORS ``AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE UNIVERSITY OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The following license covers the files from Intel's "Highly Optimized Mathematical Functions for Itanium" collection:

Intel License Agreement

Copyright (c) 2000, Intel Corporation

All rights reserved.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are

met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

* The name of Intel Corporation may not be used to endorse or promote products derived from this software without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL INTEL OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

The files inet/getnameinfo.c and sysdeps/posix/getaddrinfo.c are copyright (C) by Craig Metz and are distributed under the following license:

```
/* The Inner Net License,  
Version 2.00
```

The author(s) grant permission for redistribution and use in source and binary forms, with or without modification, of the software and documentation provided that the following conditions are met:

0. If you receive a version of the software that is specifically labelled as not being for redistribution (check the version message and/or README), you are not permitted to redistribute that version of the software in any way or form.
1. All terms of the all other applicable copyrights and licenses must be followed.
2. Redistributions of source code must retain the authors' copyright notice(s), this list of conditions, and the following disclaimer.
3. Redistributions in binary form must reproduce the authors' copyright notice(s), this list of conditions, and the following disclaimer in the documentation and/or other materials provided with the distribution.
4. [The copyright holder has authorized the removal of this clause.]

5. Neither the name(s)
of the author(s) nor the names of its contributors
may be used to endorse or promote products derived from this software
without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY ITS AUTHORS AND CONTRIBUTORS ``AS IS" AND ANY
EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED
WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE
DISCLAIMED. IN NO EVENT SHALL THE AUTHORS OR CONTRIBUTORS BE LIABLE FOR ANY
DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES
(INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES;
LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON
ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT
(INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS
SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

If these license terms cause you a real problem, contact the author. */

The file sunrpc/des_impl.c
is copyright Eric Young:

Copyright (C) 1992 Eric Young
Collected from libdes and modified for SECURE RPC by Martin Kuck 1994
This file is distributed under the terms of the GNU Lesser General
Public License, version 2.1 or later - see the file COPYING.LIB for details.
If you did not receive a copy of the license with this program, please
see <<http://www.gnu.org/licenses/>> to obtain a copy.

The libidn code is copyright Simon Josefsson, with portions copyright
The Internet Society, Tom Tromey and Red Hat, Inc.:

Copyright (C) 2002, 2003, 2004, 2011 Simon Josefsson

This file is part of GNU Libidn.

GNU Libidn is free software; you can redistribute it and/or
modify it under the terms of the GNU Lesser General Public
License as published by the Free Software Foundation; either
version 2.1 of the License, or (at your option) any later version.

GNU Libidn is distributed in the hope that it will be useful,
but WITHOUT ANY WARRANTY; without even the implied warranty of
MERCHANTABILITY
or FITNESS FOR A PARTICULAR PURPOSE. See the GNU
Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public
License along with GNU Libidn; if not, see <<http://www.gnu.org/licenses/>>.

The following notice applies to portions of libidn/nfkc.c:

This file contains functions from GLIB, including gutf8.c and gunidecomp.c, all licensed under LGPL and copyright hold by:

Copyright (C) 1999, 2000 Tom Tromeey
Copyright 2000 Red Hat, Inc.

The following applies to portions of libidn/punycodc.c and libidn/punycodc.h:

This file is derived from RFC 3492bis written by Adam M. Costello.

Disclaimer and license: Regarding this entire document or any portion of it (including the pseudocode and C code), the author makes no guarantees and is not responsible for any damage resulting from its use. The author grants irrevocable permission to anyone to use, modify, and distribute it in any way that does not diminish the rights of anyone else to use, modify, and distribute it, provided that redistributed derivative works do not contain misleading author or version information. Derivative works need not be licensed under similar terms.

Copyright (C) The Internet Society (2003). All Rights Reserved.

This document and translations of it may be copied and furnished to others, and derivative works that comment on or otherwise explain it or assist in its implementation may be prepared, copied, published and distributed, in whole or in part, without restriction of any kind, provided that the above copyright notice and this paragraph are included on all such copies and derivative works. However, this document itself may not be modified in any way, such as by removing the copyright notice or references to the Internet Society or other Internet organizations, except as needed for the purpose of developing Internet standards in which case the procedures for copyrights defined in the Internet Standards process must be followed, or as required to translate it into languages other than English.

The limited permissions granted above are perpetual and will not be revoked by the Internet Society or its successors or assigns.

This document and the information contained herein is provided on an "AS IS" basis and THE INTERNET SOCIETY AND THE INTERNET ENGINEERING TASK FORCE DISCLAIMS ALL WARRANTIES, EXPRESS OR IMPLIED, INCLUDING

BUT NOT LIMITED TO ANY WARRANTY THAT THE USE OF THE INFORMATION
HEREIN WILL NOT INFRINGE ANY RIGHTS OR ANY IMPLIED WARRANTIES OF
MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

The file inet/rcmd.c is under a UCB copyright and the following:

Copyright (C) 1998 WIDE Project.
All rights reserved.

Redistribution and use in source and binary forms, with or without
modification, are permitted provided that the following conditions
are met:

1. Redistributions of source code must retain the above copyright
notice, this list of conditions and the following disclaimer.
2. Redistributions
in binary form must reproduce the above copyright
notice, this list of conditions and the following disclaimer in the
documentation and/or other materials provided with the distribution.
3. Neither the name of the project nor the names of its contributors
may be used to endorse or promote products derived from this software
without specific prior written permission.

THIS SOFTWARE IS PROVIDED BY THE PROJECT AND CONTRIBUTORS ``AS IS" AND
ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE
IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE
ARE DISCLAIMED. IN NO EVENT SHALL THE PROJECT OR CONTRIBUTORS BE LIABLE
FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL
DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS
OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION)
HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT
LIABILITY, OR TORT (INCLUDING NEGLIGENCE
OR OTHERWISE) ARISING IN ANY WAY
OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF
SUCH DAMAGE.

The file posix/runtests.c is copyright Tom Lord:

Copyright 1995 by Tom Lord

All Rights Reserved

Permission to use, copy, modify, and distribute this software and its
documentation for any purpose and without fee is hereby granted,
provided that the above copyright notice appear in all copies and that
both that copyright notice and this permission notice appear in
supporting documentation, and that the name of the copyright holder not be
used in advertising or publicity pertaining to distribution of the
software without specific, written prior permission.

Tom Lord DISCLAIMS ALL WARRANTIES WITH REGARD TO THIS SOFTWARE, INCLUDING ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS, IN NO EVENT SHALL TOM LORD BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES WHATSOEVER RESULTING FROM LOSS OF USE, DATA OR PROFITS, WHETHER IN AN ACTION OF CONTRACT, NEGLIGENCE OR OTHER TORTIOUS ACTION, ARISING OUT OF OR IN CONNECTION WITH THE USE OR PERFORMANCE OF THIS SOFTWARE.

The posix/rxspencer tests are copyright Henry Spencer:

Copyright 1992, 1993, 1994, 1997 Henry Spencer. All rights reserved. This software is not subject to any license of the American Telephone and Telegraph Company or of the Regents of the University of California.

Permission is granted to anyone to use this software for any purpose on any computer system, and to alter it and redistribute it, subject to the following restrictions:

1. The author is not responsible for the consequences of use of this software, no matter how awful, even if they arise from flaws in it.
2. The origin of this software must not be misrepresented, either by explicit claim or by omission. Since few users ever read sources, credits must appear in the documentation.
3. Altered versions must be plainly marked as such, and must not be misrepresented as being the original software. Since few users ever read sources, credits must appear in the documentation.
4. This notice may not be removed or altered.

The file posix/PCRE.tests is copyright University of Cambridge:

Copyright (c) 1997-2003 University of Cambridge

Permission is granted to anyone to use this software for any purpose on any computer system, and to redistribute it freely, subject to the following restrictions:

1. This software is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE.
2. The origin of this software must not be misrepresented, either by explicit claim or by omission. In practice, this means that if you use

PCRE in software that you distribute to others, commercially or otherwise, you must put a sentence like this

Regular expression support is provided by the PCRE library package, which is open source software, written by Philip Hazel, and copyright by the University of Cambridge, England.

somewhere reasonably visible in your documentation and in any relevant files or online help data or similar. A reference to the ftp site for the source, that is, to

<ftp://ftp.csx.cam.ac.uk/pub/software/programming/pcre/>

should also be given in the documentation. However, this condition is not intended to apply to whole chains of software. If package A includes PCRE, it must acknowledge it, but if package B is software that includes package A, the condition is not imposed on package B (unless it uses PCRE independently).

3. Altered versions must be plainly marked as such, and must not be misrepresented as being the original software.
4. If PCRE is embedded in any software that is released under the GNU General Purpose Licence (GPL), or Lesser General Purpose Licence (LGPL), then the terms of that licence shall supersede any condition above with which it is incompatible.

Files

from Sun fdlibm are copyright Sun Microsystems, Inc.:

Copyright (C) 1993 by Sun Microsystems, Inc. All rights reserved.

Developed at SunPro, a Sun Microsystems, Inc. business.

Permission to use, copy, modify, and distribute this software is freely granted, provided that this notice is preserved.

Part of stdio-common/tst-printf.c is copyright C E Chew:

(C) Copyright C E Chew

Feel free to copy, use and distribute this software provided:

1. you do not pretend that you wrote it
2. you leave this copyright notice intact.

Various long double libm functions are copyright Stephen L. Moshier:

Copyright 2001 by Stephen L. Moshier <moshier@na-net.ornl.gov>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, see <<http://www.gnu.org/licenses/>>. */

GNU LESSER GENERAL PUBLIC LICENSE
Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.
59 Temple Place, Suite 330, Boston, MA 02111-1307 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that

you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

^L

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a

combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

^L

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or

other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License").

Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the

ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

^L

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The

threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute

the object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

^L

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a)

Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will

operate properly with a modified version of the library, if the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

^L

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited

by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

^L

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any

such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

^L

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this.

Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO

WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

^L

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful,

but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.253 network-manager 1.0.6-27.el7

1.253.1 Available under license :

Unless a COPYING file in a subdirectory or file-specific license headers specify a different license, the following applies to all files in this directory and all subdirectories.

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

GNU GENERAL PUBLIC LICENSE
Version 2, June 1991

Copyright (C) 1989, 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users. This General Public License applies to most of the Free Software Foundation's software and to any other program whose authors commit to using it. (Some other Free Software Foundation software is covered by the GNU Library General Public License instead.) You can apply it to your programs, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the software, or if you modify it.

For example, if you distribute copies of such a program, whether gratis or for a fee, you must give the recipients all the rights that you have. You must make sure that they, too, receive or can get the source code. And you must show them these terms so they know their rights.

We protect your rights with two steps: (1) copyright the software, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the software.

Also, for each author's protection and ours, we want to make certain that everyone understands that there is no warranty for this free software. If the software is modified by someone else and passed on, we want its recipients to know that what they have is not the original, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents. We wish to avoid the danger that redistributors of a free program will individually obtain patent licenses, in effect making the program proprietary. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

The precise terms and conditions for copying, distribution and modification follow.

GNU GENERAL PUBLIC LICENSE
TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License applies to any program or other work which contains a notice placed by the copyright holder saying it may be distributed under the terms of this General Public License. The "Program", below, refers to any such program or work, and a "work based on the Program" means either the Program or any derivative work under copyright law: that is to say, a work containing the Program or a portion of it, either verbatim or with modifications and/or translated into another language. (Hereinafter, translation is included without limitation in the term "modification".) Each licensee is addressed as "you".

Activities

other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running the Program is not restricted, and the output from the Program is covered only if its contents constitute a work based on the Program (independent of having been made by running the Program). Whether that is true depends on what the Program does.

1. You may copy and distribute verbatim copies of the Program's source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and give any other recipients of the Program a copy of this License along with the Program.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Program or any portion of it, thus forming a work based on the Program, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) You must cause the modified files to carry prominent notices stating that you changed the files and the date of any change.
- b) You must cause any work that you distribute or publish, that in whole or in part contains or is derived from the Program or any part thereof, to be licensed as a whole at no charge to all third parties under the terms of this License.

c) If the modified program normally reads commands interactively when run, you must cause it, when started running for such interactive use in the most ordinary way, to print or display an announcement including an appropriate copyright notice and a notice that there is no warranty (or else, saying that you provide a warranty) and that users may redistribute the program under these conditions, and telling the user how to view a copy of this License. (Exception: if the Program itself is interactive but does not normally print such an announcement, your work based on the Program is not required to print an announcement.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Program, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Program, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Program.

In addition, mere aggregation of another work not based on the Program with the Program (or with a work based on the Program) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may copy and distribute the Program (or a work based on it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you also do one of the following:

a) Accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

b) Accompany it with a written offer, valid for at least three years, to give any third party, for a charge no more than your cost of physically performing source distribution, a complete

machine-readable copy of the corresponding source code, to be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange; or,

c) Accompany it with the information you received as to the offer to distribute corresponding source code. (This alternative is allowed only for noncommercial distribution and only if you received the program in object code or executable form with such an offer, in accord with Subsection b above.)

The source code for a work means the preferred form of the work for making modifications to it. For an executable work, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the executable. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

If distribution of executable or object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place counts as distribution of the source code, even though third parties are not compelled to copy the source along with the object code.

4. You may not copy, modify, sublicense, or distribute the Program except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense or distribute the Program is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

5. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Program or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Program (or any work based on the Program), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Program or works based on it.

6. Each time you redistribute the Program (or any work based on the Program), the recipient automatically receives a license from the original licensor to copy, distribute or modify the Program subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein.

You are not responsible for enforcing compliance by third parties to this License.

7. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Program at all. For example, if a patent license would not permit royalty-free redistribution of the Program by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Program.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system, which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

8. If the distribution and/or use of the Program is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Program under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

9. The Free Software Foundation may publish revised and/or new versions of the General Public License from time to time. Such new versions will

be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Program specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Program does not specify a version number of this License, you may choose any version ever published by the Free Software Foundation.

10. If you wish to incorporate parts of the Program into other free programs whose distribution conditions are different, write to the author to ask for permission. For software which is copyrighted by the Free Software

Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

11. BECAUSE THE PROGRAM IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE PROGRAM, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE PROGRAM "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE PROGRAM IS WITH YOU. SHOULD THE PROGRAM PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

12. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE PROGRAM AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE PROGRAM (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE PROGRAM TO OPERATE WITH ANY OTHER PROGRAMS), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Programs

If you develop a new program, and you want it to be of the greatest

possible use to the public, the best way to achieve this is to make it free software which everyone can redistribute and change under these terms.

To do so, attach the following notices to the program. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the program's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This program is free software; you can redistribute it and/or modify it under the terms of the GNU General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This program is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU General Public License for more details.

You should have received a copy of the GNU General Public License along with this program; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA

Also add information on how to contact you by electronic and paper mail.

If the program is interactive, make it output a short notice like this when it starts in an interactive mode:

```
Gnomovision version 69, Copyright (C) year name of author  
Gnomovision comes with ABSOLUTELY NO WARRANTY; for details type `show w'.  
This is free software, and you are welcome to redistribute it  
under certain conditions; type `show c' for details.
```

The hypothetical commands `show w' and `show c' should show the appropriate parts of the General Public License. Of course, the commands you use may be called something other than `show w' and `show c'; they could even be mouse-clicks or menu items--whatever suits your program.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the program, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the program

`Gnomovision' (which makes passes at compilers) written by
James Hacker.

<signature of Ty Coon>, 1 April 1989
Ty Coon, President of Vice

This General Public License does not permit incorporating your program into proprietary programs. If your program is a subroutine library, you may consider it more useful to permit linking proprietary applications with the library. If this is what you want to do, use the GNU Library General Public License instead of this License.

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

GNU LIBRARY GENERAL PUBLIC LICENSE

Version 2, June 1991

Copyright (C) 1991 Free Software Foundation, Inc.
51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA
Everyone is permitted to copy and distribute verbatim copies
of this license document, but changing it is not allowed.

[This is the first released version of the library GPL. It is
numbered 2 because it goes with version 2 of the ordinary GPL.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Library General Public License, applies to some specially designated Free Software Foundation software, and to any other libraries whose authors decide to use it. You can use it for your libraries, too.

When we speak of free software, we are referring to freedom, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish), that you receive source code or can get it if you want it, that you can change the software or use pieces of it in new free programs; and that you know you can do these things.

To protect your rights, we need to make restrictions that forbid anyone to deny you these rights or to ask you to surrender the rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library, or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link a program with the library, you must provide complete object files to the recipients so that they can relink them with the library, after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

Our method of protecting your rights has two steps: (1) copyright the library, and (2) offer you this license which gives you legal permission to copy, distribute and/or modify the library.

Also, for each distributor's protection, we want to make certain that everyone understands that there is no warranty for this free library. If the library is modified by someone else and passed on, we want its recipients to know that what they have is not the original version, so that any problems introduced by others will not reflect on the original authors' reputations.

Finally, any free program is threatened constantly by software patents.

We wish to avoid the danger that companies distributing free software will individually obtain patent licenses, thus in effect transforming the program into proprietary software. To prevent this, we have made it clear that any patent must be licensed for everyone's free use or not licensed at all.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License, which was designed for utility programs. This license, the GNU Library General Public License, applies to certain designated libraries. This license is quite different from the ordinary one; be sure to read it in full, and don't assume that anything in it is the same as in the ordinary license.

The reason we have a separate public license for some libraries is that they blur the distinction we usually make between modifying or adding to a program and simply using it. Linking a program with a library, without changing the library, is in some sense simply using the library, and is analogous

to running a utility program or application program. However, in a textual and legal sense, the linked executable is a combined work, a derivative of the original library, and the ordinary General Public License

treats it as such.

Because of this blurred distinction, using the ordinary General Public License for libraries did not effectively promote software sharing, because most developers did not use the libraries. We concluded that weaker conditions might promote sharing better.

However, unrestricted linking of non-free programs would deprive the users of those programs of all benefit from the free status of the libraries themselves. This Library General Public License is intended to permit developers of non-free programs to use free libraries, while preserving your freedom as a user of such programs to change the free libraries that are incorporated in them. (We have not seen how to achieve this as regards changes in header files, but we have achieved it as regards changes in the actual functions of the Library.) The hope is that this will lead to faster development of free libraries.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, while the latter only works together with the library.

Note that it is possible for a library to be covered by the ordinary General Public License rather than by this special one.

GNU LIBRARY GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Library General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.
- c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.
- d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of

its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus,
it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the object code for the work under the terms of Section 6. Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also compile or link a "work that uses the Library" with the Library to produce a

work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

- a) Accompany the work with the complete corresponding machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)
- b) Accompany the work with a written offer, valid for at least three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.
- c) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.
- d) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the source code distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work

based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works.

These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties to

this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13.

The Free Software Foundation may publish revised and/or new versions of the Library General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest

possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey

the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

```
<one line to give the library's name and a brief idea of what it does.>  
Copyright (C) <year> <name of author>
```

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Library General Public License as published by the Free Software Foundation; either version 2 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Library General Public License for more details.

You should have received a copy of the GNU Library General Public License along with this library; if not, write to the Free Software Foundation, Inc., 51 Franklin Street, Fifth Floor, Boston, MA 02110-1301 USA.

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

```
<signature of Ty Coon>, 1 April 1990  
Ty Coon, President of Vice
```

That's all there is to it!

1.254 nss-pem 1.0.3-5.el7

1.254.1 Available under license :

MOZILLA PUBLIC LICENSE

Version 1.1

1. Definitions.

1.0.1. "Commercial Use" means distribution or otherwise making the Covered Code available to a third party.

1.1. "Contributor" means each entity that creates or contributes to the creation of Modifications.

1.2. "Contributor Version" means the combination of the Original Code, prior Modifications used by a Contributor, and the Modifications made by that particular Contributor.

1.3. "Covered Code" means the Original Code or Modifications or the combination of the Original Code and Modifications, in each case including portions thereof.

1.4. "Electronic Distribution Mechanism" means a mechanism generally accepted in the software development community for the electronic transfer of data.

1.5. "Executable" means Covered Code in any form other than Source Code.

1.6. "Initial Developer" means the individual or entity identified as the Initial Developer in the Source Code notice required by Exhibit A.

1.7. "Larger Work" means a work which combines Covered Code or portions thereof with code not governed by the terms of this License.

1.8. "License" means this document.

1.8.1. "Licensable" means having the right to grant, to the maximum extent possible, whether at the time of the initial grant or subsequently acquired, any and all of the rights conveyed herein.

1.9. "Modifications" means any addition to or deletion from the substance or structure of either the Original Code or any previous Modifications. When Covered Code is released as a series of files, a Modification is:

A. Any addition to or deletion from the contents of a file containing Original Code or previous Modifications.

B. Any new file that contains any part of the Original Code or previous Modifications.

1.10. "Original Code" means Source Code of computer software code which is described in the Source Code notice required by Exhibit A as Original Code, and which, at the time of its release under this License is not already Covered Code governed by this License.

1.10.1. "Patent Claims" means any patent claim(s), now owned or hereafter acquired, including without limitation, method, process, and apparatus claims, in any patent Licensable by grantor.

1.11. "Source Code" means the preferred form of the Covered Code for making modifications to it, including all modules it contains, plus any associated interface definition files, scripts used to control compilation and installation of an Executable, or source code differential comparisons against either the Original Code or another well known, available Covered Code of the Contributor's choice. The Source Code can be in a compressed or archival form, provided the appropriate decompression or de-archiving software is widely available for no charge.

1.12. "You" (or "Your") means an individual or a legal entity exercising rights under, and complying with all of the terms of, this License or a future version of this License issued under Section 6.1. For legal entities, "You" includes any entity which controls, is controlled by, or is under common control with You. For purposes of this definition, "control" means (a) the power, direct or indirect, to cause the direction or management of such entity, whether by contract or otherwise, or (b) ownership of more than fifty percent (50%) of the outstanding shares or beneficial ownership of such entity.

2. Source Code License.

2.1. The Initial Developer Grant.

The Initial Developer hereby grants You a world-wide, royalty-free, non-exclusive license, subject to third party intellectual property

claims:

- (a) under intellectual property rights (other than patent or trademark) Licensable by Initial Developer to use, reproduce, modify, display, perform, sublicense and distribute the Original Code (or portions thereof) with or without Modifications, and/or as part of a Larger Work; and

(b) under Patents Claims infringed by the making, using or selling of Original Code, to make, have made, use, practice, sell, and offer for sale, and/or otherwise dispose of the Original Code (or portions thereof).

(c) the licenses granted in this Section 2.1(a) and (b) are effective on the date Initial Developer first distributes Original Code under the terms of this License.

(d) Notwithstanding Section 2.1(b) above, no patent license is granted: 1) for code that You delete from the Original Code; 2) separate from the Original Code; or 3) for infringements caused by: i) the modification of the Original Code or ii) the combination of the Original Code with other software or devices.

2.2. Contributor Grant.

Subject to third party intellectual property claims, each Contributor hereby grants You a world-wide, royalty-free, non-exclusive license

(a) under intellectual property rights (other than patent or trademark) Licensable by Contributor, to use, reproduce, modify, display, perform, sublicense and distribute the Modifications created by such Contributor (or portions thereof) either on an unmodified basis, with other Modifications, as Covered Code and/or as part of a Larger Work; and

(b) under Patent Claims infringed by the making, using, or selling of Modifications made by that Contributor either alone and/or in combination with its Contributor Version (or portions of such combination), to make, use, sell, offer for sale, have made, and/or otherwise dispose of: 1) Modifications made by that Contributor (or portions thereof); and 2) the combination of Modifications made by that Contributor with its Contributor Version (or portions of such combination).

(c) the licenses granted in Sections 2.2(a) and 2.2(b) are effective on the date Contributor first makes Commercial Use of the Covered Code.

(d) Notwithstanding Section 2.2(b) above, no patent license is granted: 1) for any code that Contributor has deleted from the Contributor Version; 2) separate from the Contributor Version; 3) for infringements caused by: i) third party modifications of Contributor Version or ii) the combination of Modifications made by that Contributor with other software (except as part of the Contributor Version) or other devices; or 4) under Patent Claims

infringed by Covered Code in the absence of Modifications made by that Contributor.

3. Distribution Obligations.

3.1. Application of License.

The Modifications which You create or to which You contribute are governed by the terms of this License, including without limitation Section 2.2. The Source Code version of Covered Code may be distributed only under the terms of this License or a future version of this License released under Section 6.1, and You must include a copy of this License with every copy of the Source Code You distribute. You may not offer or impose any terms on any Source Code version that alters or restricts the applicable version of this License or the recipients' rights hereunder. However, You may include an additional document offering the additional rights described in Section 3.5.

3.2. Availability of Source Code.

Any Modification which You create or to which You contribute must be made available in Source Code form under the terms of this License either on the same media as an Executable version or via an accepted Electronic Distribution Mechanism to anyone to whom you made an Executable version available; and if made available via Electronic Distribution Mechanism, must remain available for at least twelve (12) months after the date it initially became available, or at least six (6) months after a subsequent version of that particular Modification has been made available to such recipients. You are responsible for ensuring that the Source Code version remains available even if the Electronic Distribution Mechanism is maintained by a third party.

3.3. Description of Modifications.

You must cause all Covered Code to which You contribute to contain a file documenting the changes You made to create that Covered Code and the date of any change. You must include a prominent statement that the Modification is derived, directly or indirectly, from Original Code provided by the Initial Developer and including the name of the Initial Developer in (a) the Source Code, and (b) in any notice in an Executable version or related documentation in which You describe the origin or ownership of the Covered Code.

3.4. Intellectual Property Matters

(a) Third Party Claims.

If Contributor has knowledge that a license under a third party's intellectual property rights is required to exercise the rights granted by such Contributor under Sections 2.1 or 2.2,

Contributor must include a text file with the Source Code distribution titled "LEGAL" which describes the claim and the party making the claim in sufficient detail that a recipient will know whom to contact. If Contributor obtains such knowledge after the Modification is made available as described in Section 3.2, Contributor shall promptly modify the LEGAL file in all copies Contributor makes available thereafter and shall take other steps (such as notifying appropriate mailing lists or newsgroups) reasonably calculated to inform those who received the Covered Code that new knowledge has been obtained.

(b) Contributor APIs.

If Contributor's Modifications include an application programming interface and Contributor has knowledge of patent licenses which are reasonably necessary to implement that API, Contributor must also include this information in the LEGAL file.

(c) Representations.

Contributor represents that, except as disclosed pursuant to Section 3.4(a) above, Contributor believes that Contributor's Modifications are Contributor's original creation(s) and/or Contributor has sufficient rights to grant the rights conveyed by

this License.

3.5. Required Notices.

You must duplicate the notice in Exhibit A in each file of the Source Code. If it is not possible to put such notice in a particular Source Code file due to its structure, then You must include such notice in a location (such as a relevant directory) where a user would be likely to look for such a notice. If You created one or more Modification(s) You may add your name as a Contributor to the notice described in Exhibit A. You must also duplicate this License in any documentation for the Source Code where You describe recipients' rights or ownership rights relating to Covered Code. You may choose to offer, and to charge a fee for, warranty, support, indemnity or liability obligations to one or more recipients of Covered Code. However, You may do so only on Your own behalf, and not on behalf of the Initial Developer or any Contributor. You must make it absolutely clear than any such warranty, support, indemnity or liability obligation is offered by You alone, and You hereby agree to indemnify the Initial Developer and every Contributor for any liability incurred by the Initial Developer or such Contributor as a result of warranty, support, indemnity or liability terms You offer.

3.6. Distribution of Executable Versions.

You may distribute Covered Code in Executable form only if the requirements of Section 3.1-3.5 have been met for that Covered Code,

and if You include a notice stating that the Source Code version of the Covered Code is available under the terms of this License, including a description of how and where You have fulfilled the obligations of Section 3.2. The notice must be conspicuously included in any notice in an Executable version, related documentation or collateral in which You describe recipients' rights relating to the Covered Code. You may distribute the Executable version of Covered

Code or ownership rights under a license of Your choice, which may contain terms different from this License, provided that You are in compliance with the terms of this License and that the license for the Executable version does not attempt to limit or alter the recipient's rights in the Source Code version from the rights set forth in this License. If You distribute the Executable version under a different license You must make it absolutely clear that any terms which differ from this License are offered by You alone, not by the Initial Developer or any Contributor. You hereby agree to indemnify the Initial Developer and every Contributor for any liability incurred by the Initial Developer or such Contributor as a result of any such terms You offer.

3.7. Larger Works.

You may create a Larger Work by combining Covered Code with other code not governed by the terms of this License and distribute the Larger

Work as a single product. In such a case, You must make sure the requirements of this License are fulfilled for the Covered Code.

4. Inability to Comply Due to Statute or Regulation.

If it is impossible for You to comply with any of the terms of this License with respect to some or all of the Covered Code due to statute, judicial order, or regulation then You must: (a) comply with the terms of this License to the maximum extent possible; and (b) describe the limitations and the code they affect. Such description must be included in the LEGAL file described in Section 3.4 and must be included with all distributions of the Source Code. Except to the extent prohibited by statute or regulation, such description must be sufficiently detailed for a recipient of ordinary skill to be able to understand it.

5. Application of this License.

This License applies to code to which the Initial Developer has attached the notice in Exhibit A and to related Covered Code.

6. Versions of the License.

6.1. New Versions.

Netscape Communications Corporation ("Netscape") may publish revised and/or new versions of the License from time to time. Each version will be given a distinguishing version number.

6.2. Effect of New Versions.

Once Covered Code has been published under a particular version of the License, You may always continue to use it under the terms of that version. You may also choose to use such Covered Code under the terms of any subsequent version of the License published by Netscape. No one other than Netscape has the right to modify the terms applicable to Covered Code created under this License.

6.3. Derivative Works.

If You create or use a modified version of this License (which you may only do in order to apply it to code which is not already Covered Code governed by this License), You must (a) rename

Your license so that

the phrases "Mozilla", "MOZILLAPL", "MOZPL", "Netscape", "MPL", "NPL" or any confusingly similar phrase do not appear in your license (except to note that your license differs from this License) and (b) otherwise make it clear that Your version of the license contains terms which differ from the Mozilla Public License and Netscape Public License. (Filling in the name of the Initial Developer, Original Code or Contributor in the notice described in Exhibit A shall not of themselves be deemed to be modifications of this License.)

7. DISCLAIMER OF WARRANTY.

COVERED CODE IS PROVIDED UNDER THIS LICENSE ON AN "AS IS" BASIS, WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, WITHOUT LIMITATION, WARRANTIES THAT THE COVERED CODE IS FREE OF DEFECTS, MERCHANTABILITY, FIT FOR A PARTICULAR PURPOSE OR NON-INFRINGEMENT. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE COVERED CODE IS WITH YOU. SHOULD ANY COVERED CODE PROVE DEFECTIVE IN ANY RESPECT, YOU (NOT THE INITIAL DEVELOPER OR ANY OTHER CONTRIBUTOR) ASSUME THE COST OF ANY NECESSARY SERVICING, REPAIR OR CORRECTION. THIS DISCLAIMER OF WARRANTY CONSTITUTES AN ESSENTIAL PART OF THIS LICENSE. NO USE OF ANY COVERED CODE IS AUTHORIZED HEREUNDER EXCEPT UNDER THIS DISCLAIMER.

8. TERMINATION.

8.1. This License and the rights granted hereunder will terminate automatically if You fail to comply with terms herein and fail to cure such breach within 30 days of becoming aware of the breach. All sublicenses to the Covered Code which are properly granted shall survive any termination of this License. Provisions which, by their

nature, must remain in effect beyond the termination of this License shall survive.

8.2. If You initiate litigation by asserting a patent infringement claim (excluding declaratory judgment actions) against Initial Developer or

a Contributor (the Initial Developer or Contributor against whom You file such action is referred to as "Participant") alleging that:

(a) such Participant's Contributor Version directly or indirectly infringes any patent, then any and all rights granted by such Participant to You under Sections 2.1 and/or 2.2 of this License shall, upon 60 days notice from Participant terminate prospectively, unless if within 60 days after receipt of notice You either: (i) agree in writing to pay Participant a mutually agreeable reasonable royalty for Your past and future use of Modifications made by such Participant, or (ii) withdraw Your litigation claim with respect to the Contributor Version against such Participant. If within 60 days of notice, a reasonable royalty and payment arrangement are not mutually agreed upon in writing by the parties or the litigation claim is not withdrawn, the rights granted by Participant to You under Sections 2.1 and/or 2.2 automatically terminate at the expiration of the 60 day notice period specified above.

(b) any software, hardware, or device, other than such Participant's Contributor Version, directly or indirectly infringes any patent, then any rights granted to You by such Participant under Sections 2.1(b) and 2.2(b) are revoked effective as of the date You first made, used, sold, distributed, or had made, Modifications made by that Participant.

8.3. If You assert a patent infringement claim against Participant alleging that such Participant's Contributor Version directly or indirectly infringes any patent where such claim is resolved (such as by license or settlement) prior to the initiation of patent infringement litigation, then the reasonable value of the licenses granted by such Participant under Sections 2.1 or 2.2 shall be taken into account in determining the amount or value of any payment or license.

8.4. In the event of termination under Sections 8.1 or 8.2 above, all end user license agreements (excluding distributors and resellers) which have been validly granted by You or any distributor hereunder prior to termination shall survive termination.

9. LIMITATION OF LIABILITY.

UNDER NO CIRCUMSTANCES AND UNDER NO LEGAL THEORY, WHETHER TORT (INCLUDING NEGLIGENCE), CONTRACT, OR OTHERWISE, SHALL YOU, THE INITIAL DEVELOPER, ANY OTHER CONTRIBUTOR, OR ANY DISTRIBUTOR OF COVERED CODE, OR ANY SUPPLIER OF ANY OF SUCH PARTIES, BE LIABLE TO ANY PERSON FOR ANY INDIRECT, SPECIAL, INCIDENTAL, OR CONSEQUENTIAL DAMAGES OF ANY CHARACTER INCLUDING, WITHOUT LIMITATION, DAMAGES FOR LOSS OF GOODWILL, WORK STOPPAGE, COMPUTER FAILURE OR MALFUNCTION, OR ANY AND ALL OTHER COMMERCIAL DAMAGES OR LOSSES, EVEN IF SUCH PARTY SHALL HAVE BEEN INFORMED OF THE POSSIBILITY OF SUCH DAMAGES. THIS LIMITATION OF LIABILITY SHALL

NOT APPLY TO LIABILITY FOR DEATH OR PERSONAL INJURY RESULTING FROM SUCH PARTY'S NEGLIGENCE TO THE EXTENT APPLICABLE LAW PROHIBITS SUCH LIMITATION. SOME JURISDICTIONS DO NOT ALLOW THE EXCLUSION OR LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THIS EXCLUSION AND LIMITATION MAY NOT APPLY TO YOU.

10. U.S. GOVERNMENT END USERS.

The Covered Code is a "commercial item," as that term is defined in 48 C.F.R. 2.101 (Oct. 1995), consisting of "commercial computer software" and "commercial computer software documentation," as such terms are used in 48 C.F.R. 12.212 (Sept. 1995). Consistent with 48 C.F.R. 12.212 and 48 C.F.R. 227.7202-1 through 227.7202-4 (June 1995), all U.S. Government End Users acquire Covered Code with only those rights set forth herein.

11. MISCELLANEOUS.

This License represents the complete agreement concerning subject matter hereof. If any provision of this License is held to be unenforceable, such provision shall be reformed only to the extent necessary to make it enforceable. This License shall be governed by California law provisions (except to the extent applicable law, if any, provides otherwise), excluding its conflict-of-law provisions. With respect to disputes in which at least one party is a citizen of, or an entity chartered or registered to do business in the United States of America, any litigation relating to this License shall be subject to the jurisdiction of the Federal Courts of the Northern District of California, with venue lying in Santa Clara County, California, with the losing party responsible for costs, including without limitation, court costs and reasonable attorneys' fees and expenses. The application of the United Nations Convention on Contracts for the International Sale of Goods is expressly excluded. Any law or regulation which provides that the language of a contract shall be construed against the drafter shall not apply to this License.

12. RESPONSIBILITY FOR CLAIMS.

As between Initial Developer and the Contributors, each party is responsible for claims and damages arising, directly or indirectly, out of its utilization of rights under this License and You agree to work with Initial Developer and Contributors to distribute such responsibility on an equitable basis. Nothing herein is intended or shall be deemed to constitute any admission of liability.

13. MULTIPLE-LICENSED CODE.

Initial Developer may designate portions of the Covered Code as "Multiple-Licensed". "Multiple-Licensed" means that the Initial Developer permits you to utilize portions of the Covered Code under Your choice of the MPL or the alternative licenses, if any, specified by the Initial Developer in the file described in Exhibit A.

EXHIBIT A -Mozilla Public License.

``The contents of this file are subject to the Mozilla
Public License

Version 1.1 (the "License"); you may not use this file except in compliance with the License. You may obtain a copy of the License at <https://www.mozilla.org/MPL/>

Software distributed under the License is distributed on an "AS IS" basis, WITHOUT WARRANTY OF ANY KIND, either express or implied. See the License for the specific language governing rights and limitations under the License.

The Original Code is _____.

The Initial Developer of the Original Code is _____.
Portions created by _____ are Copyright (C) _____
_____. All Rights Reserved.

Contributor(s): _____.

Alternatively, the contents of this file may be used under the terms of the _____ license (the "[_____] License"), in which case the provisions of [_____] License are applicable instead of those above.

If you wish to allow use of your version of this file only under the terms of the [_____] License and not to allow others to use your version of this file under the MPL, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the [_____] License. If you do not delete

the provisions above, a recipient may use your version of this file under either the MPL or the [___] License."

[NOTE: The text of this Exhibit A may differ slightly from the text of the notices in the Source Code files of the Original Code. You should use the text of this Exhibit A rather than the text found in the Original Code Source Code for Your Modifications.]

1.255 libasynchs 0.8

1.255.1 Available under license :

GNU LESSER GENERAL PUBLIC LICENSE

Version 2.1, February 1999

Copyright (C) 1991, 1999 Free Software Foundation, Inc.

59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Everyone is permitted to copy and distribute verbatim copies of this license document, but changing it is not allowed.

[This is the first released version of the Lesser GPL. It also counts as the successor of the GNU Library Public License, version 2, hence the version number 2.1.]

Preamble

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public Licenses are intended to guarantee your freedom to share and change free software--to make sure the software is free for all its users.

This license, the Lesser General Public License, applies to some specially designated software packages--typically libraries--of the Free Software Foundation and other authors who decide to use it. You can use it too, but we suggest you first think carefully about whether this license or the ordinary General Public License is the better strategy to use in any particular case, based on the explanations below.

When we speak of free software, we are referring to freedom of use, not price. Our General Public Licenses are designed to make sure that you have the freedom to distribute copies of free software (and charge for this service if you wish); that you receive source code or can get it if you want it; that you can change the software and use pieces of it in new free programs; and that you are informed that you can do these things.

To protect your rights, we need to make restrictions that forbid distributors to deny you these rights or to ask you to surrender these rights. These restrictions translate to certain responsibilities for you if you distribute copies of the library or if you modify it.

For example, if you distribute copies of the library, whether gratis or for a fee, you must give the recipients all the rights that we gave you. You must make sure that they, too, receive or can get the source code. If you link other code with the library, you must provide complete object files to the recipients, so that they can relink them with the library after making changes to the library and recompiling it. And you must show them these terms so they know their rights.

We protect your rights with a two-step method: (1) we copyright the library, and (2) we offer you this license, which gives you legal permission to copy, distribute and/or modify the library.

To protect each distributor, we want to make it very clear that there is no warranty for the free library. Also, if the library is modified by someone else and passed on, the recipients should know that what they have is not the original version, so that the original author's reputation will not be affected by problems that might be introduced by others.

Finally, software patents pose a constant threat to the existence of any free program. We wish to make sure that a company cannot effectively restrict the users of a free program by obtaining a restrictive license from a patent holder. Therefore, we insist that any patent license obtained for a version of the library must be consistent with the full freedom of use specified in this license.

Most GNU software, including some libraries, is covered by the ordinary GNU General Public License. This license, the GNU Lesser General Public License, applies to certain designated libraries, and is quite different from the ordinary General Public License. We use this license for certain libraries in order to permit linking those libraries into non-free programs.

When a program is linked with a library, whether statically or using a shared library, the combination of the two is legally speaking a combined work, a derivative of the original library. The ordinary General Public License therefore permits such linking only if the entire combination fits its criteria of freedom. The Lesser General Public License permits more lax criteria for linking other code with

the library.

We call this license the "Lesser" General Public License because it does Less to protect the user's freedom than the ordinary General Public License. It also provides other free software developers Less of an advantage over competing non-free programs. These disadvantages are the reason we use the ordinary General Public License for many libraries. However, the Lesser license provides advantages in certain special circumstances.

For example, on rare occasions, there may be a special need to encourage the widest possible use of a certain library, so that it becomes a de-facto standard. To achieve this, non-free programs must be allowed to use the library. A more frequent case is that a free library does the same job as widely used non-free libraries. In this case, there is little to gain by limiting the free library to free software only, so we use the Lesser General Public License.

In other cases, permission to use a particular library in non-free programs enables a greater number of people to use a large body of free software. For example, permission to use the GNU C Library in non-free programs enables many more people to use the whole GNU operating system, as well as its variant, the GNU/Linux operating system.

Although the Lesser General Public License is Less protective of the users' freedom, it does ensure that the user of a program that is linked with the Library has the freedom and the wherewithal to run that program using a modified version of the Library.

The precise terms and conditions for copying, distribution and modification follow. Pay close attention to the difference between a "work based on the library" and a "work that uses the library". The former contains code derived from the library, whereas the latter must be combined with the library in order to run.

GNU LESSER GENERAL PUBLIC LICENSE TERMS AND CONDITIONS FOR COPYING, DISTRIBUTION AND MODIFICATION

0. This License Agreement applies to any software library or other program which contains a notice placed by the copyright holder or other authorized party saying it may be distributed under the terms of this Lesser General Public License (also called "this License"). Each licensee is addressed as "you".

A "library" means a collection of software functions and/or data

prepared so as to be conveniently linked with application programs (which use some of those functions and data) to form executables.

The "Library", below, refers to any such software library or work which has been distributed under these terms. A "work based on the Library" means either the Library or any derivative work under copyright law: that is to say, a work containing the Library or a portion of it, either verbatim or with modifications and/or translated straightforwardly into another language. (Hereinafter, translation is included without limitation in the term "modification".)

"Source code" for a work means the preferred form of the work for making modifications to it. For a library, complete source code means all the source code for all modules it contains, plus any associated interface definition files, plus the scripts used to control compilation and installation of the library.

Activities other than copying, distribution and modification are not covered by this License; they are outside its scope. The act of running a program using the Library is not restricted, and output from such a program is covered only if its contents constitute a work based on the Library (independent of the use of the Library in a tool for writing it). Whether that is true depends on what the Library does and what the program that uses the Library does.

1. You may copy and distribute verbatim copies of the Library's complete source code as you receive it, in any medium, provided that you conspicuously and appropriately publish on each copy an appropriate copyright notice and disclaimer of warranty; keep intact all the notices that refer to this License and to the absence of any warranty; and distribute a copy of this License along with the Library.

You may charge a fee for the physical act of transferring a copy, and you may at your option offer warranty protection in exchange for a fee.

2. You may modify your copy or copies of the Library or any portion of it, thus forming a work based on the Library, and copy and distribute such modifications or work under the terms of Section 1 above, provided that you also meet all of these conditions:

- a) The modified work must itself be a software library.
- b) You must cause the files modified to carry prominent notices stating that you changed the files and the date of any change.

c) You must cause the whole of the work to be licensed at no charge to all third parties under the terms of this License.

d) If a facility in the modified Library refers to a function or a table of data to be supplied by an application program that uses the facility, other than as an argument passed when the facility is invoked, then you must make a good faith effort to ensure that, in the event an application does not supply such function or table, the facility still operates, and performs whatever part of its purpose remains meaningful.

(For example, a function in a library to compute square roots has a purpose that is entirely well-defined independent of the application. Therefore, Subsection 2d requires that any application-supplied function or table used by this function must be optional: if the application does not supply it, the square root function must still compute square roots.)

These requirements apply to the modified work as a whole. If identifiable sections of that work are not derived from the Library, and can be reasonably considered independent and separate works in themselves, then this License, and its terms, do not apply to those sections when you distribute them as separate works. But when you distribute the same sections as part of a whole which is a work based on the Library, the distribution of the whole must be on the terms of this License, whose permissions for other licensees extend to the entire whole, and thus to each and every part regardless of who wrote it.

Thus, it is not the intent of this section to claim rights or contest your rights to work written entirely by you; rather, the intent is to exercise the right to control the distribution of derivative or collective works based on the Library.

In addition, mere aggregation of another work not based on the Library with the Library (or with a work based on the Library) on a volume of a storage or distribution medium does not bring the other work under the scope of this License.

3. You may opt to apply the terms of the ordinary GNU General Public

License instead of this License to a given copy of the Library. To do this, you must alter all the notices that refer to this License, so that they refer to the ordinary GNU General Public License, version 2, instead of to this License. (If a newer version than version 2 of the

ordinary GNU General Public License has appeared, then you can specify that version instead if you wish.) Do not make any other change in these notices.

Once this change is made in a given copy, it is irreversible for that copy, so the ordinary GNU General Public License applies to all subsequent copies and derivative works made from that copy.

This option is useful when you wish to copy part of the code of the Library into a program that is not a library.

4. You may copy and distribute the Library (or a portion or derivative of it, under Section 2) in object code or executable form under the terms of Sections 1 and 2 above provided that you accompany it with the complete corresponding machine-readable source code, which must be distributed under the terms of Sections 1 and 2 above on a medium customarily used for software interchange.

If distribution of object code is made by offering access to copy from a designated place, then offering equivalent access to copy the source code from the same place satisfies the requirement to distribute the source code, even though third parties are not compelled to copy the source along with the object code.

5. A program that contains no derivative of any portion of the Library, but is designed to work with the Library by being compiled or linked with it, is called a "work that uses the Library". Such a work, in isolation, is not a derivative work of the Library, and therefore falls outside the scope of this License.

However, linking a "work that uses the Library" with the Library creates an executable that is a derivative of the Library (because it contains portions of the Library), rather than a "work that uses the library". The executable is therefore covered by this License. Section 6 states terms for distribution of such executables.

When a "work that uses the Library" uses material from a header file that is part of the Library, the object code for the work may be a derivative work of the Library even though the source code is not. Whether this is true is especially significant if the work can be linked without the Library, or if the work is itself a library. The threshold for this to be true is not precisely defined by law.

If such an object file uses only numerical parameters, data structure layouts and accessors, and small macros and small inline functions (ten lines or less in length), then the use of the object

file is unrestricted, regardless of whether it is legally a derivative work. (Executables containing this object code plus portions of the Library will still fall under Section 6.)

Otherwise, if the work is a derivative of the Library, you may distribute the

object code for the work under the terms of Section 6.

Any executables containing that work also fall under Section 6, whether or not they are linked directly with the Library itself.

6. As an exception to the Sections above, you may also combine or link a "work that uses the Library" with the Library to produce a work containing portions of the Library, and distribute that work under terms of your choice, provided that the terms permit modification of the work for the customer's own use and reverse engineering for debugging such modifications.

You must give prominent notice with each copy of the work that the Library is used in it and that the Library and its use are covered by this License. You must supply a copy of this License. If the work during execution displays copyright notices, you must include the copyright notice for the Library among them, as well as a reference directing the user to the copy of this License. Also, you must do one of these things:

a) Accompany

the work with the complete corresponding

machine-readable source code for the Library including whatever changes were used in the work (which must be distributed under Sections 1 and 2 above); and, if the work is an executable linked with the Library, with the complete machine-readable "work that uses the Library", as object code and/or source code, so that the user can modify the Library and then relink to produce a modified executable containing the modified Library. (It is understood that the user who changes the contents of definitions files in the Library will not necessarily be able to recompile the application to use the modified definitions.)

b) Use a suitable shared library mechanism for linking with the

Library. A suitable mechanism is one that (1) uses at run time a copy of the library already present on the user's computer system, rather than copying library functions into the executable, and (2) will operate

properly with a modified version of the library, if

the user installs one, as long as the modified version is interface-compatible with the version that the work was made with.

c) Accompany the work with a written offer, valid for at least

three years, to give the same user the materials specified in Subsection 6a, above, for a charge no more than the cost of performing this distribution.

d) If distribution of the work is made by offering access to copy from a designated place, offer equivalent access to copy the above specified materials from the same place.

e) Verify that the user has already received a copy of these materials or that you have already sent this user a copy.

For an executable, the required form of the "work that uses the Library" must include any data and utility programs needed for reproducing the executable from it. However, as a special exception, the materials to be distributed need not include anything that is normally distributed (in either source or binary form) with the major components (compiler, kernel, and so on) of the operating system on which the executable runs, unless that component itself accompanies the executable.

It may happen that this requirement contradicts the license restrictions of other proprietary libraries that do not normally accompany the operating system. Such a contradiction means you cannot use both them and the Library together in an executable that you distribute.

7. You may place library facilities that are a work based on the Library side-by-side in a single library together with other library facilities not covered by this License, and distribute such a combined library, provided that the separate distribution of the work based on the Library and of the other library facilities is otherwise permitted, and provided that you do these two things:

a) Accompany the combined library with a copy of the same work based on the Library, uncombined with any other library facilities. This must be distributed under the terms of the Sections above.

b) Give prominent notice with the combined library of the fact that part of it is a work based on the Library, and explaining where to find the accompanying uncombined form of the same work.

8. You may not copy, modify, sublicense, link with, or distribute the Library except as expressly provided under this License. Any attempt otherwise to copy, modify, sublicense, link with, or distribute the Library is void, and will automatically terminate your

rights under this License. However, parties who have received copies, or rights, from you under this License will not have their licenses terminated so long as such parties remain in full compliance.

9. You are not required to accept this License, since you have not signed it. However, nothing else grants you permission to modify or distribute the Library or its derivative works. These actions are prohibited by law if you do not accept this License. Therefore, by modifying or distributing the Library (or any work based on the Library), you indicate your acceptance of this License to do so, and all its terms and conditions for copying, distributing or modifying the Library or works based on it.

10. Each time you redistribute the Library (or any work based on the Library), the recipient automatically receives a license from the original licensor to copy, distribute, link with or modify the Library subject to these terms and conditions. You may not impose any further restrictions on the recipients' exercise of the rights granted herein. You are not responsible for enforcing compliance by third parties with this License.

11. If, as a consequence of a court judgment or allegation of patent infringement or for any other reason (not limited to patent issues), conditions are imposed on you (whether by court order, agreement or otherwise) that contradict the conditions of this License, they do not excuse you from the conditions of this License. If you cannot distribute so as to satisfy simultaneously your obligations under this License and any other pertinent obligations, then as a consequence you may not distribute the Library at all. For example, if a patent license would not permit royalty-free redistribution of the Library by all those who receive copies directly or indirectly through you, then the only way you could satisfy both it and this License would be to refrain entirely from distribution of the Library.

If any portion of this section is held invalid or unenforceable under any particular circumstance, the balance of the section is intended to apply, and the section as a whole is intended to apply in other circumstances.

It is not the purpose of this section to induce you to infringe any patents or other property right claims or to contest validity of any such claims; this section has the sole purpose of protecting the integrity of the free software distribution system which is implemented by public license practices. Many people have made generous contributions to the wide range of software distributed

through that system in reliance on consistent application of that system; it is up to the author/donor to decide if he or she is willing to distribute software through any other system and a licensee cannot impose that choice.

This section is intended to make thoroughly clear what is believed to be a consequence of the rest of this License.

12. If the distribution and/or use of the Library is restricted in certain countries either by patents or by copyrighted interfaces, the original copyright holder who places the Library under this License may add an explicit geographical distribution limitation excluding those countries, so that distribution is permitted only in or among countries not thus excluded. In such case, this License incorporates the limitation as if written in the body of this License.

13. The Free Software Foundation may publish revised and/or new versions of the Lesser General Public License from time to time. Such new versions will be similar in spirit to the present version, but may differ in detail to address new problems or concerns.

Each version is given a distinguishing version number. If the Library specifies a version number of this License which applies to it and "any later version", you have the option of following the terms and conditions either of that version or of any later version published by the Free Software Foundation. If the Library does not specify a license version number, you may choose any version ever published by the Free Software Foundation.

14. If you wish to incorporate parts of the Library into other free programs whose distribution conditions are incompatible with these, write to the author to ask for permission. For software which is copyrighted by the Free Software Foundation, write to the Free Software Foundation; we sometimes make exceptions for this. Our decision will be guided by the two goals of preserving the free status of all derivatives of our free software and of promoting the sharing and reuse of software generally.

NO WARRANTY

15. BECAUSE THE LIBRARY IS LICENSED FREE OF CHARGE, THERE IS NO WARRANTY FOR THE LIBRARY, TO THE EXTENT PERMITTED BY APPLICABLE LAW. EXCEPT WHEN OTHERWISE STATED IN WRITING THE COPYRIGHT HOLDERS AND/OR OTHER PARTIES PROVIDE THE LIBRARY "AS IS" WITHOUT WARRANTY OF ANY KIND, EITHER EXPRESSED OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR

PURPOSE. THE ENTIRE RISK AS TO THE QUALITY AND PERFORMANCE OF THE LIBRARY IS WITH YOU. SHOULD THE LIBRARY PROVE DEFECTIVE, YOU ASSUME THE COST OF ALL NECESSARY SERVICING, REPAIR OR CORRECTION.

16. IN NO EVENT UNLESS REQUIRED BY APPLICABLE LAW OR AGREED TO IN WRITING WILL ANY COPYRIGHT HOLDER, OR ANY OTHER PARTY WHO MAY MODIFY AND/OR REDISTRIBUTE THE LIBRARY AS PERMITTED ABOVE, BE LIABLE TO YOU FOR DAMAGES, INCLUDING ANY GENERAL, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OR INABILITY TO USE THE LIBRARY (INCLUDING BUT NOT LIMITED TO LOSS OF DATA OR DATA BEING RENDERED INACCURATE OR LOSSES SUSTAINED BY YOU OR THIRD PARTIES OR A FAILURE OF THE LIBRARY TO OPERATE WITH ANY OTHER SOFTWARE), EVEN IF SUCH HOLDER OR OTHER PARTY HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

END OF TERMS AND CONDITIONS

How to Apply These Terms to Your New Libraries

If you develop a new library, and you want it to be of the greatest possible use to the public, we recommend making it free software that everyone can redistribute and change. You can do so by permitting redistribution under these terms (or, alternatively, under the terms of the ordinary General Public License).

To apply these terms, attach the following notices to the library. It is safest to attach them to the start of each source file to most effectively convey the exclusion of warranty; and each file should have at least the "copyright" line and a pointer to where the full notice is found.

<one line to give the library's name and a brief idea of what it does.>
Copyright (C) <year> <name of author>

This library is free software; you can redistribute it and/or modify it under the terms of the GNU Lesser General Public License as published by the Free Software Foundation; either version 2.1 of the License, or (at your option) any later version.

This library is distributed in the hope that it will be useful, but WITHOUT ANY WARRANTY; without even the implied warranty of MERCHANTABILITY or FITNESS FOR A PARTICULAR PURPOSE. See the GNU Lesser General Public License for more details.

You should have received a copy of the GNU Lesser General Public

License along with this library; if not, write to the Free Software Foundation, Inc., 59 Temple Place, Suite 330, Boston, MA 02111-1307 USA

Also add information on how to contact you by electronic and paper mail.

You should also get your employer (if you work as a programmer) or your school, if any, to sign a "copyright disclaimer" for the library, if necessary. Here is a sample; alter the names:

Yoyodyne, Inc., hereby disclaims all copyright interest in the library `Frob' (a library for tweaking knobs) written by James Random Hacker.

<signature of Ty Coon>, 1 April 1990
Ty Coon, President of Vice

That's all there is to it!

1.256 libev 4.15

1.256.1 Available under license :

All files in libev are

Copyright (c)2007,2008,2009,2010,2011,2012,2013 Marc Alexander Lehmann.

Redistribution and use in source and binary forms, with or without modification, are permitted provided that the following conditions are met:

* Redistributions of source code must retain the above copyright notice, this list of conditions and the following disclaimer.

* Redistributions in binary form must reproduce the above copyright notice, this list of conditions and the following disclaimer in the documentation and/or other materials provided with the distribution.

THIS SOFTWARE IS PROVIDED BY THE COPYRIGHT HOLDERS AND CONTRIBUTORS "AS IS" AND ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE DISCLAIMED. IN NO EVENT SHALL THE COPYRIGHT OWNER OR CONTRIBUTORS BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT

(INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

Alternatively, the contents of this package may be used under the terms of the GNU General Public License ("GPL") version 2 or any later version, in which case the provisions of the GPL are applicable instead of the above. If you wish to allow the use of your version of this package only under the terms of the GPL and not to allow others to use your version of this file under the BSD license, indicate your decision by deleting the provisions above and replace them with the notice and other provisions required by the GPL in this and the other files of this package. If you do not delete the provisions above, a recipient may use your version of this file under either the BSD or the GPL.

Cisco and the Cisco logo are trademarks or registered trademarks of Cisco and/or its affiliates in the U.S. and other countries. To view a list of Cisco trademarks, go to this URL: www.cisco.com/go/trademarks. Third-party trademarks mentioned are the property of their respective owners. The use of the word partner does not imply a partnership relationship between Cisco and any other company. (1110R)

©2024 Cisco Systems, Inc. All rights reserved.